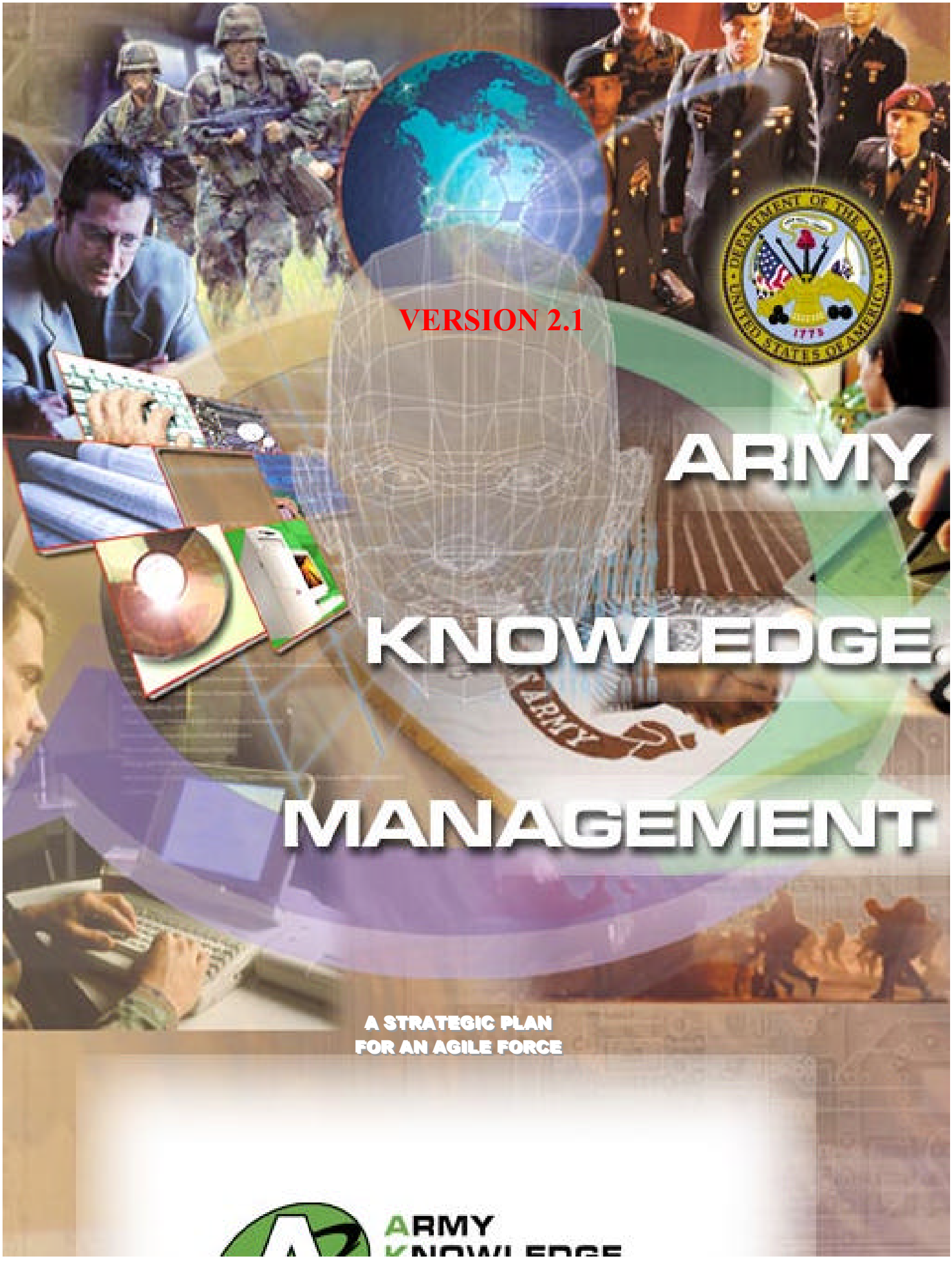

VERSION 2.1

ARMY KNOWLEDGE MANAGEMENT

A STRATEGIC PLAN
FOR AN AGILE FORCE

ARMY
KNOWLEDGE

A STRATEGIC PLAN FOR AN AGILE FORCE

Version 2.1

Army Chief Information Officer

8 August 2001

DEPARTMENT OF THE ARMY
WASHINGTON, D.C. 20310

AUG 8 2001

FOREWORD
ARMY KNOWLEDGE MANAGEMENT STRATEGIC PLAN

America's Army is the world's premier land fighting force. To maintain our global military prowess in the 21st century, The Army is transforming to be strategically responsive and dominant across the full spectrum of operations in a complex, dynamic global environment. As part of its Transformation, The Army is making fundamental shifts with its organization and mission processes, and how it manages and uses information concepts and technologies. The Army is transforming to a knowledge-based organization - - now.

The Army Knowledge Management Strategic Plan outlines our vision, goals, and objectives to become a knowledge-based organization. Our vision:

"A transformed Army, with agile capabilities and adaptive processes powered by world class network-centric access to knowledge, systems, and services, interoperable with the Joint environment."

The Army's goal with this plan is to transform itself into a network-centric, knowledge based organization. This goal is intended to give The Army decision dominance – in the battlespace, in our organizations, and in our mission processes. To achieve this goal, our Army intellectual capital (individuals, teams, organizations, systems, collaborative insights and experiences), infostructure capabilities, and governance structures must be properly structured for effective decisions. This plan recognizes that becoming a knowledge-based organization involves more than technologies -- it requires deep cultural shifts – from traditional practices to collaboration, teamwork, and innovation; from information hoarding to knowledge sharing; from stovepipe to enterprise processes; and from traditional skills to Internet-Age competencies.

Leadership and trust are at the heart of Army knowledge management. We need your advocacy, support and commitment to implement this plan - - to ensure The Army has the decision dominance to win - - decisively - - both as warfighters and in our business practices.

Eric K. Shinseki
General, United States Army
Chief of Staff

Thomas E. White
Secretary of the Army

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Army Knowledge Management (AKM)

"Army Knowledge Management (AKM) is a comprehensive strategy to transform The Army into a network-centric, knowledge-based force. It consists of a robust set of goals and objectives that, once achieved, will improve decision dominance by tactical commanders and business stewards. The goals and objectives concentrate on managing the information technology infrastructure as an enterprise in line with the Global Information Grid, with a view toward reducing the footprint and creating ubiquitous access, through Army Knowledge Online as the enterprise portal, to knowledge, systems, and services. The use of best business and governance practices and the emphasis on innovative human capital strategies are key goals of AKM. Army Knowledge Management is a strategic transformer for The Army and is a key component of Army Transformation."

Influenced by Army Transformation, the global e-business model, and the imperatives of electronic government, The Army sees a critical need to build a knowledge-based organization that is agile and adaptable in the face of the many challenges of the future. Therefore, this strategic plan for Army Knowledge Management (AKM) is built on guiding principles that reflect a consensus of Army leadership concerning current and future external and internal challenges. Externally, The Army faces a global environment of constant change and uncertainty. The Information Age creates a constantly changing glut of information that is impossible to handle without technology. Yet, technology is expensive, constantly advancing, and changing the way information is handled. Internally, The Army has limited resources in terms of dollars and people and many legacy systems that are not adaptable to an enterprise environment. Old ways of doing business are no longer effective or efficient.

According to futurist Alvin Toffler, new ways of doing business in the 21st Century depend on an organization's ability to access, filter, and disseminate valuable information that can generate new knowledge. The new knowledge typically affects the actions and decisions of the organization. This is the essence of knowledge management. It uses technology to deliver disparate pieces of information, in an easily accessible, enterprise-wide system. Corporate intelligence in the form of experience and insight is applied to the information to generate knowledge that increases the organization's capacity to act.

Web-enabling e-business and e-government models have also demonstrated a capability to achieve better service at lower cost. The cost efficiencies and

increased effectiveness achieved by other services and industry is evidence that The Army cannot remain as it is, but must evolve, transform and grow to meet the threats facing our nation in the 21st Century.

For The Army, the implementation of knowledge management means several important things. First, the infrastructure must be developed to accommodate faster processing capabilities and dissemination requirements. Second, an easily accessible enterprise wide system requires network-centric processes and services available through a portal. Third, information that leads to knowledge must be well organized and structured. This is typically accomplished through content management. Fourth, knowledge generation requires knowledge transfer. This means sharing knowledge across the enterprise using enabling techniques such as collaborative tools and expertise locators. Fifth, we must develop and sustain an interdisciplinary workforce empowered to share knowledge across functions.

Knowledge management is more than infostructure and enabling technologies. It leverages the intellectual capital of an enterprise, no matter where it resides, to give the enterprise an advantage in accomplishing business processes. Intellectual capital is defined as the experience, insight, and expertise of the people who work for the enterprise. Thus, the people or human dimension of knowledge management are as important, perhaps even more so, than the technological ones.

People are critical to the strategic plan because they share knowledge across the entire enterprise. But, sharing knowledge isn't easy. In many organizations, people hoard knowledge because the culture doesn't recognize and reward them for sharing their experiences and insights. Also, the careers of most people progress based upon what they know and not what they share. Furthermore, most individuals do not understand the concepts and principles of knowledge management. They see no benefit to sharing knowledge. Thus, these roadblocks remain additional challenges for The Army to promote knowledge sharing throughout the enterprise.

This plan begins to address both the human dimension and the technological ones. It contains five overarching goals to incorporate knowledge management into The Army enterprise. While each goal has its own focus, together the goals comprise a systematic approach. Goal one concentrates on the culture including new approaches to governing and public relations. Goal two actualizes knowledge management concepts to bring collaborative computing to individuals and organizations. Goal three creates the infostructure and technological base to support enterprise knowledge capabilities. Goal four expands the NIPRNET and SIPRNET portals, Army Knowledge Online (AKO) and (AKO-S), to accommodate the 1.2 million Army customers (Active Duty military, Department of The Army civilians, National Guard and Army Reserves). It also expands AKO

to connect people to a fully functional, knowledge management system that provides a gateway to organized content, databases, information warehouses, collaborative tools, and people and expertise locators. Goal five concentrates on human capital. It includes the recruitment, development and retention of people who are adaptive and agile thinkers.

Together, the goals of this plan represent a fundamental shift in how The Army views organizations and processes and how it manages the infostructure. It establishes a collaborative business model to accomplish missions in either the Operational or Institutional Army. This plan also uses enabling technologies to deliver information and generate knowledge across the enterprise. It highlights web-enabling processes and services, migrates legacy systems and makes them easily accessible, network-centric common systems and services.

Army leaders realize knowledge management has the potential to improve decision-making and to accomplish missions more efficiently and effectively. They understand that technology is a critical component of knowledge management and getting the infostructure right will be vital. But, they also realize technology and the infostructure are still simply enablers. Technical solutions must work in concert with people. Technology, people and organizational culture are the crux of knowledge management. As people integrate the technology into their daily work routines, they will find sharing their expertise and insight with others becoming easier and more rewarding. This way, people develop the culture that not only sustains knowledge management, but also embraces it.

To this end, The Army has formulated a conceptual framework to achieve a knowledge-based, network-centric enterprise that constantly learns and shares experiences, insights, and expertise. In other words, the framework embeds knowledge management into daily processes and operations of The Army. This framework is depicted in Figure 1, The Knowledge-Based Organization.

The Knowledge-Based Organization

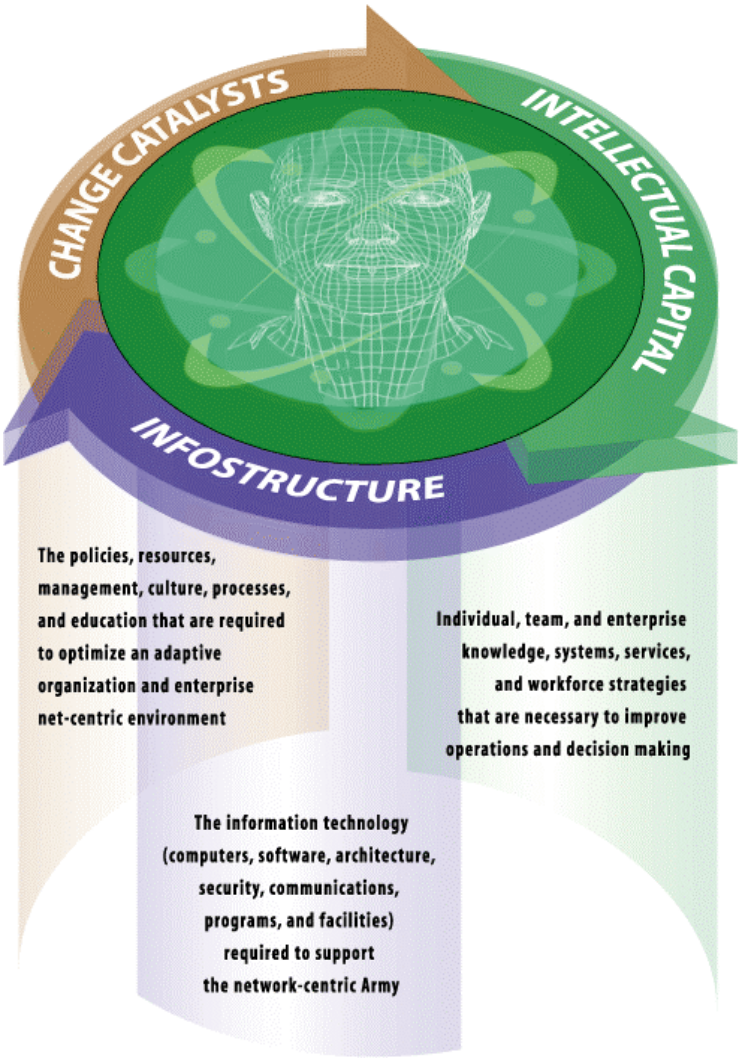


Figure 1 The Knowledge-Based Organization

According to General John M. Keane, Vice Chief of Staff, US Army:

"Sharing information and getting good feedback needs to be encouraged. We need to undergo change to adapt and become a knowledge-based, learning organization."

It is essential that all levels within The Army understand and support the strategic goals for AKM. Organizational leaders set the cultural tone and develop people. People do the work of migrating systems, web-enabling processes, and using new technologies. Establishing new governing bodies and pursuing innovative organizational relationships ensure knowledge management is executed. This requires revision of existing governing bodies and reinvigorating existing partnerships to ensure the fundamental change. Functional proponents apply the AKM concepts and principles set forth in this strategic plan to standardize, integrate and web-enable their processes.

The planning horizon for this plan is FY01-07. It outlines the vision, goals, and objectives for The Army to become a knowledge-based organization, identifying near-term initiatives that are actionable. The Chief of Staff of The Army led through guidance and direction while the Chief Information Officer (CIO) of The Army led the formulation of the strategic initiatives set forth in this plan. The Army CIO established The Army CIO Executive Board, which is chartered to be the board of directors for The Army Knowledge Management (AKM) Program. HQDA staff agencies and major command (MACOM) representation on this board have been instrumental in shaping and providing a consensus on the goals and objectives of AKM.

The Army CIO with direction and guidance from the Chief of Staff of The Army and advice from the Army CIO Executive Board will guide the formulation of new strategic initiatives over time, consistent with the vision, the guiding principles, and the goals of The Army Knowledge Management Program.

The purpose of this plan is to establish The Army as a knowledge-based organization through a strong knowledge management program using robust information technology and the intellectual capital of its people and systems to enable the timely transfers of knowledge anywhere, anytime. As such, this plan defines knowledge management (KM) and outlines a framework and strategy for managing The Army's knowledge assets and resources. It also states a vision for the knowledge-based Army that it realizes in the goals, objectives and initiatives of this plan.

The AKM Strategic Plan applies directly to both the Operational and Institutional Army, capitalizing on information technology and current Army and DoD information management and knowledge management capabilities, such as the Global Information Grid (GIG), e-Business/e-Commerce, and Army Knowledge Online (AKO). This plan will establish a framework that will allow the Operational Army to reach back to the Institutional Army in order to anticipate requirements and synchronize support requirements. Section 2.4 (Relationships to Department of Defense Policy & Guidelines) further elaborates on the linkages between the AKM vision and other Army, DoD, and Joint strategic visions.

Joint Vision 2020 recognizes the information environment (enterprise) consists of the aggregate of individuals, organizations, and systems that collect, process, and disseminate information. The standard approach has been to separate The Army into two; the Operational Army in the field, and the Institutional Army that supports the planning and training to accomplish the tactical missions. The scope of this plan is initially focused toward the business enterprise with the understanding that detailed planning must address the interdependence with the tactical base.

The AKM Strategic Plan is divided into four sections:

Section I describes the purpose, scope, planning approach and overall management of the plan to track the achievement of the goals, objectives and initiatives listed.

Section II provides background information and identifies the drivers leading the effort to become a knowledge-based organization. This section also provides the vision, goals, guiding principles, and goals and links the AKM strategy to other Army, DoD, and Joint strategies.

Section III provides the supporting rationale for each goal and documents the associated objectives and specific initiatives to achieve the vision. A lead organization is assigned to each initiative and target milestones are identified.

Section IV lists references, laws, regulations, policies, definitions and acronyms.

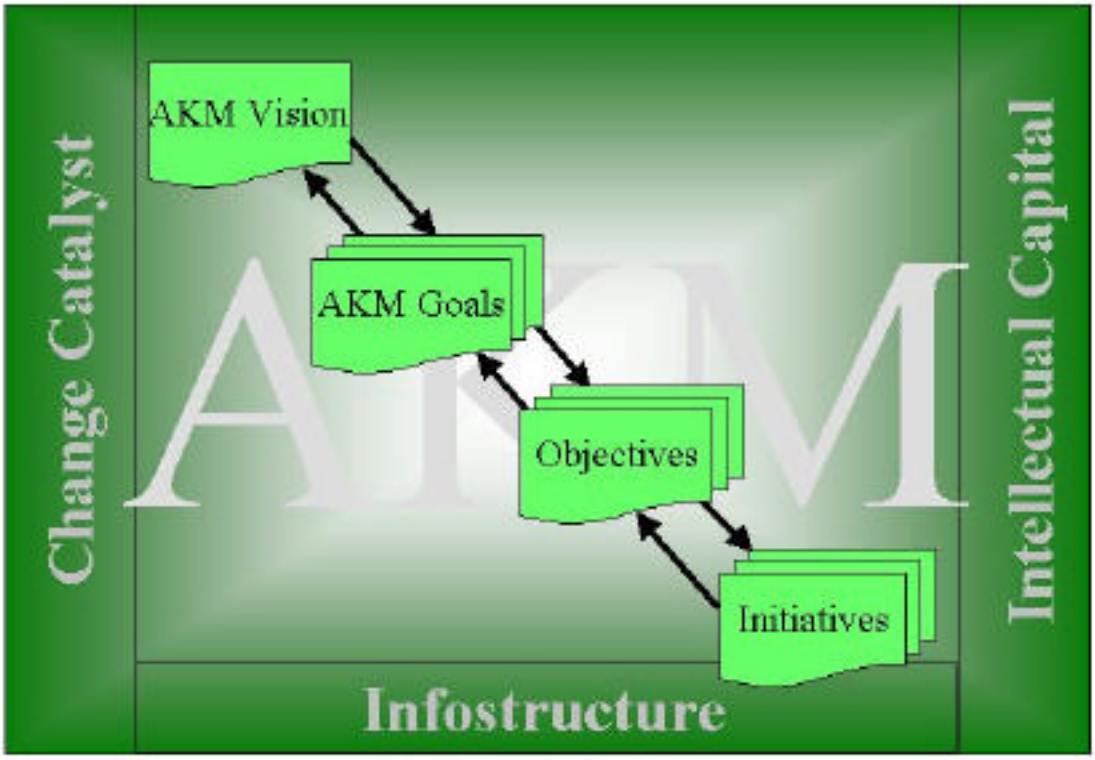


Figure 2 AKM Conceptual Framework

Figure 2 displays the process of transforming The Army into a knowledge-based organization. This strategic plan incorporates the conceptual KM framework of change catalyst, intellectual capital, and infostructure to realize the AKM Vision that describes the desired end state. The goals are broad statements that describe how The Army will mobilize to achieve the vision. The objectives describe specific actions necessary to achieve the goal and the initiatives are measurable actions with milestones, intended to result in tangible progress toward achieving the objectives.

This plan was initially developed in January 2001 by HQDA and MACOM representatives, using contracted groupware and facilitation techniques. Results of the groupware sessions were informally staffed. The AKM concepts were briefed to senior leaders throughout The Army (Army Four Star Commanders' Conference in February 2001; individual briefings to HQDA officials and briefings to the Senior Staff Council) to gain support of the AKM vision and concepts. Subsequently, a small team in the office of The Army CIO refined the initial draft document and concepts.

The Army CIO will develop an enterprise-level project planning/management capability to capture and integrate all AKM initiatives, milestones, and resources. The Army CIO will establish the project plan, provide oversight, and ensure the integration of initiatives. Lead organizations will have access to their portion of the project plan and are responsible for managing their initiatives, including input and maintenance of their project information. The Army CIO will receive periodic status reports from the CIO staff, HQDA and MACOM partners throughout The Army. Lead organizations will prepare status briefings on their specific initiatives to The Army CIO. Through the scheduled updates such as the Transformation Campaign Plan briefs to the Vice Chief of Staff, Army, The Army CIO will insure synchronization of all the AKM piece parts.

The balanced scorecard depicted in figure 3 reflects how the various components of Army Knowledge Management tie together under proper governance and management.

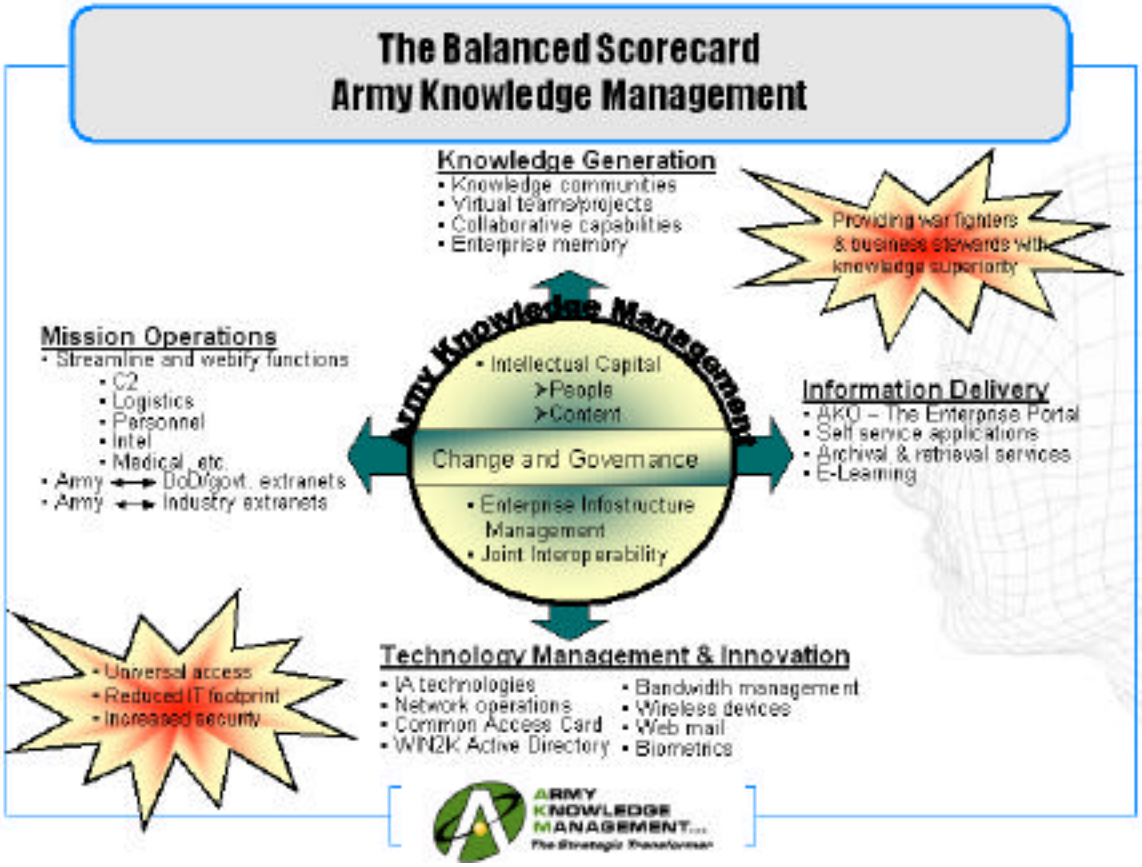


Figure 3 The Balanced Scorecard

Key contacts for this project will be posted and maintained on The Army Knowledge Online portal: www.us.army.mil/akm

The Army is in an era of profound change. The defense environment of the Post-Cold War challenges The Army to respond rapidly and decisively to a broader spectrum of missions. According to the National Military Strategy (NMS) these missions range from deterrence to mitigating regional instability, from countering weapons of mass destruction to peacekeeping, and from combating transnational dangers to thwarting aggression and providing humanitarian assistance.

To respond rapidly and decisively with the currently available resources, The Army is realigning force structure to meet current priorities and implementing business approaches to better manage the enterprise.

Internet and information technologies have affected The Army and created an information overload in which it has become difficult to filter information pertinent to the operations of The Army enterprise. The Army's client-server legacy systems, along with its outdated processes and organizational structure, impede the ability to interoperate and acquire the right information, from anywhere in the world, to support decision-making. Value-added information and real-time, ubiquitous knowledge transfer is critical to The Army enterprise.

The AKM vision further complements and augments The Army Vision that calls for The Army being "a strategic instrument of national policy" that provides "strategic dominance across the entire spectrum of operations." This requires a high level of information and knowledge about its internal processes and operations, and external activities and influences, so it may adapt the strengths and exploit the weaknesses of an adversary's decision cycle.

One tenet within Joint Vision 2020 (JV2020) is information superiority based on the right information at the right place and time to every military activity. It defines the information environment as the aggregate of individuals, organizations, and systems that collect, process, and disseminate information, including the information itself.

"A transformed Army, with agile capabilities and adaptive processes, powered by world class, network-centric access to knowledge, systems, and services, interoperable with the Joint environment."

The guiding principles for AKM are comprehensive and fundamental rules by which The Army will conduct current and future AKM initiatives. They are the underlying tenets upon which The Army will build and institutionalize its knowledge management program. These tenets will enable The Army to make a fundamental shift in how it operates as an enterprise.

The AKM guiding principles are grouped into three major areas: Change Catalysts, Intellectual Capital, and Infostructure, Change Catalysts are the innovative policies, governing bodies, and culture changes that are necessary to create a network-centric environment and a knowledge-board force. . Intellectual Capital is the expertise, insight and experience that reside in the workforce--including military, civilians, and industry partners. Infostructure refers to the hardware, software, and communication Information Technology (IT), including architecture, facilities, security, biometrics, collaboration tools, search engines, portal and web software and integrated databases.

These guiding principles serve as the foundation on which AKM will build, grow and develop.

- Foster Army values as the foundation for AKM
- Optimize Army Transformation through the enabling power of best business practices and information technology.
- Establish innovative governance capabilities to manage AKM

- Create a knowledge-based force capable of decision dominance in the battle space and business corridors
- Attract, retain, and continuously re-skill a world-class workforce
- Provide cogent information and collaborative capabilities to war fighters and business stewards

- Manage The Army Infostructure as an enterprise
- Develop Army Knowledge Online as The Army's Enterprise Portal and E-Business gateway
- Assure universal access, security, privacy, and reliability of systems and services
- Provide connectivity with Joint, Theater, and Natural sources and reach back capabilities through the Global Information Grid (GIG)

The Army Transformation Campaign Plan (TCP) is a mechanism for integrating and synchronizing all elements of The Army Vision. It contains the level of detail required to synchronize Army-wide Transformation efforts and maximize the effectiveness and efficiency of those efforts. The AKM Strategic Plan elements of Goals, Objectives and Initiatives are continually being incorporated and updated into the TCP to insure that the enabling functions provided by AKM are linked to and synchronized.

Through the Clinger-Cohen Act, the Army Chief Information Officer (CIO) has responsibility to expedite actions to ensure that C4 and Information Technology solutions for the Objective Force, as described in The Army's Transformation Campaign Plan (TCP), are delivered on schedule. These Information Technology solutions are either identical to or similar to those defined under Goal 3 of this Strategic Plan. The services provided by AKO and AKO-S for example, are the same as those provided the warfighter during peace time and conflict resolution. The synchronization with the TCP helps reduce redundant efforts and lower overall costs.

Under the TCP, the Director of Information Systems for Command, Control, Communications, and Computers (DISC4) has the following responsibilities:

1. ICW HQDA DCSOPS and DCSLOG, TRADOC, and AMC, coordinate the development of operational and support C4ISR architecture products required to develop a systems architecture and to support force development events for the Interim Force and the subsequent Objective Force.
2. IAW the BCT systems architecture Configuration Management Plan (CMP), develop and approve the systems architecture for the Initial Brigade Combat Teams and subsequent Interim and Objective Forces.
3. Support AMC in its work to establish a mechanism to ensure all digitally capable materiel is fully operational, compatible and interoperable before proving such materiel to the units.
4. Support DCSPER in its overall HR architecture and product transformation efforts to improve personnel support.

This strategic plan has linkage to the DoD Information Management (IM) Strategic Plan, the Joint Staff Information Dissemination Management (IDM) Strategy Report, the Global Information Grid (GIG) Capstone Requirements Document (CRD), and the National Security Space Architect (NSSA) Mission Information Management (MIM). In addition, it links knowledge management processes to the new DoD Directive 8-8001, Global Information Grid Overarching Policy and the DoD CIO Guidance and Policy Memorandum for the Global Information Grid (7-8170). As these guidance documents are refined and evolve, to continually support DoD and joint Strategic efforts.

This plan aligns with the JV2020 vision of:

"Information superiority provides the Joint force a competitive advantage only when it is effectively translated into superior knowledge and decisions."

This plan also supports the JV2020 mission of:

"The Joint force must be able to take advantage of superior information converted to superior knowledge to achieve "decision superiority" – better decisions arrived at and implemented faster than an opponent can react, or in a non-combat situation, at a tempo that allows the force to shape the situation or react to changes and accomplish its mission."

JV2020 language states that the direct correlation between having superior information and decision superiority is obtained through knowledge. Our mission

is to further define that correlation in terms understandable by the war fighters we support, their staffs, and those responsible for the C4 infrastructure within The Army.

The AKM Strategic Plan supports the Information Management community as defined by the DoD IM Strategic Plan:

"Provide, in a secure fashion, the right information, at the right place and time from the right sources, in a form that users can understand and reliably use to accomplish their missions and tasks, effectively and efficiently."

The DoD IM Strategic Plan describes four goals that characterize the fundamental DoD critical success factors (see figure 3). The Army KM Strategic Plan reflects this DoD framework. Goal #2 is related to the Intellectual Capital section of AKM, as described in Figure 1 (The Knowledge-Based Organization, page 4). The success of AKM depends on internal and external partnering in mission areas. Goal #3, Better Management, corresponds with the Change Catalysts portion in Figure 1. Goals #2 and #4 reflect the enterprise infostructure. The technology outlined in this plan will allow the information services and security that are necessary for a successful knowledge-sharing environment across the enterprise.

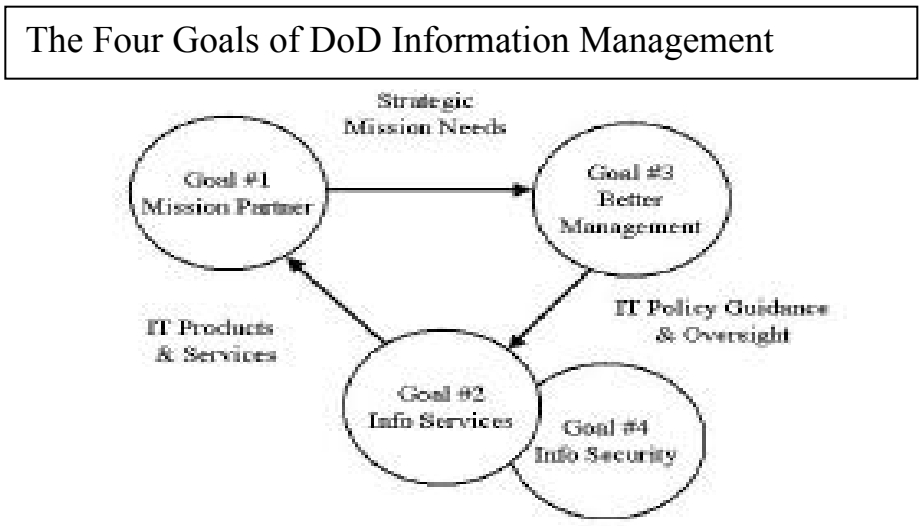


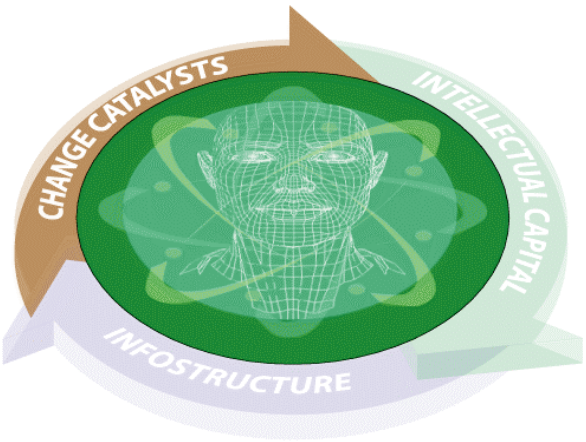
Figure 4 DoD IM Goals

The AKM Strategic Plan will help ensure interoperability of AKM with the Global Information Grid (GIG) as it matures and fills the needs of the Joint Task Force Commanders and CINCs. The Army Chief Knowledge Officer will ensure policies and procedures guiding AKM are synchronized with the GIG CRD which calls for *"processes and methods … to facilitate the proper understanding and use of*

information" and that *"Information requirements associated with the GIG shall be identified, documented, and validated by information users … and understood and acted upon by information creators and compilers…"*

- **Adopt governance and cultural changes to become a knowledge-based organization**
- **Integrate knowledge management concepts and best business practices into Army processes to improve performance**
- **Manage the infostructure as an enterprise to enhance capabilities and efficiencies**
- **Institutionalize Army Knowledge Online as the Enterprise Portal to provide universal, secure access for the entire Army**
- **Harness Human Capital for the Knowledge-Based Organization**

The KM objectives and initiatives included in the AKM plan will be worked in parallel, not in succession. If The Army waits until the culture has changed to a complete trust relationship at all levels to allow full sharing of needed information, the information will be outdated to a point of being useless to any decision maker.



The first goal acknowledges that AKM is a key driver of Army Transformation. Specifically, AKM brings to The Army streamlined functional operations, the collaborative e-business model, new horizontal and virtual governance structures, evolving new technologies, and an empowered, knowledge generating workforce.

The successful implementation of Army Knowledge Management (AKM) requires a new way of governing information technology and information management from an enterprise perspective. It also requires new or revised governing bodies to be responsible for promulgating knowledge management policies, conducting knowledge management initiatives from an enterprise level and to secure the resources to achieve AKM. The organizational structure to institutionalize AKM principles and methodologies must be established.

This objective establishes and institutionalizes the necessary governing bodies to achieve AKM. It provides an organizational framework to guide the changes that must take place to achieve the AKM vision.

The Army Chief Information Officer (CIO) is designated as the AKM functional proponent and KM champion to transform The Army into a knowledge-based organization. The Army CIO develops policy and provides governance and oversight for all Army information technology (IT) and information management (IM) issues. To support the CIO, The Army CIO Executive Board (EB), composed of general officer and Senior Executive Service (SES) level representatives from The Army Secretariat, Headquarters Department of Army staff agencies, and Major Army Commands, was established. The EB advises The Army CIO on a full range of matters pertaining to information management

(IM) and information technology (IT) in accordance with the Clinger-Cohen Act (Public Law 104-106), Government Paperwork Reduction Act (Public Law 104-13), Government Performance Results Act (Public Law 103-62) and other related Federal and DoD IM and IT directives. The CIO EB also identifies enterprise-level issues related to CIO responsibilities. It presents opportunities, makes recommendations, and sponsors cooperation in the full use of information resources. The Army CIO Executive Board coordinates actions with the DoD CIO Executive Board and the Federal CIO Council. As such, The Army CIO Executive Board is the primary advisory body for making decisions related to AKM.

Initiatives	Milestones	Lead	Support
1.1.1 Establish AKM Working Group to handle AKM implementation issues.	Nov 01	CIO EB	Army CIO
1.1.2 Incorporate AKM agenda items into Army CIO EB Summer meeting agenda.	Jul 01	Army CIO	
1.1.3 Add KM to The Army Transformation Campaign Plan.	Aug 01	Army CIO	ODCSOPS
1.1.4 Document Army-wide KM roles, missions, functions, and organizational responsibilities.	Nov 01	CIO EB	AKM Working Group/ODCSOPS/ TRADOC

Table 1 Objective 1.1

AKM must be funded in the POM and innovative strategies developed to provide the resources (manpower and dollars) to effectively transform The Army into a knowledge-based organization. To find the resources, the current approach to funding IT systems should be examined to determine if it supports the AKM vision. Proposed IT capital investments will be evaluated for potential contribution in achieving AKM. Proposals that do not support the vision will not be funded while those that streamline business processes and common services, and advance the knowledge-based organization must be funded and accelerated.

Additionally, current operational systems will be examined relative to the results they achieve and benefits they provide the enterprise-wide KM concept. If they do not contribute to a world-class net-centric knowledge system, they should be eliminated or migrated to systems that do.

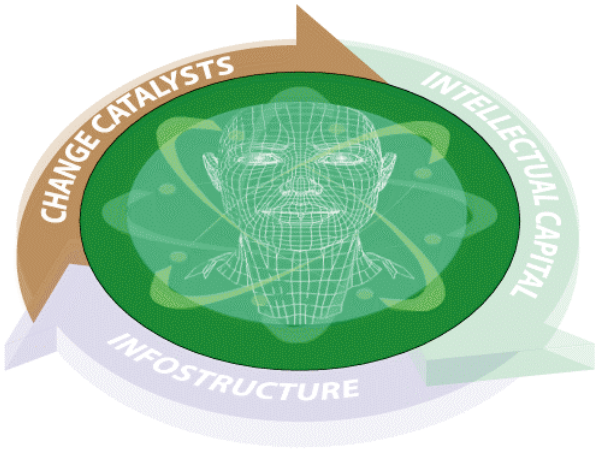
Initiatives	Milestones	Lead	Support
1.2.1 Review of MACOM IT initiatives by Army CIO Executive Board (except for centrally managed)	Oct 01	Army CIO	Army CIO Executive Board
1.2.2 Using PPBES processes, obtain necessary resources to launch the AKM program in FYs 01-03.	Jul 01 (FY01) Aug 01 (FY02) Dec 01 (FY03)	Army CIO	ASA(FM&C); DCSOPS DCSPRO/PAED
1.2.3 Work with ACSIM to develop enterprise IT A-76 studies policy and doctrine	Oct 01	ACSIM	Army CIO

Table 2 Objective 1.2

The Army must establish KM policies including Web, portal, and intranet policies that ensure uniform efforts in deployment of technologies across the enterprise. Such policies, when applicable to IM and IT, should be integrated into The Army Information Management program, AR 25-1. They also establish guidelines for open standards and interoperability. Policies specific to AKM with emphasis on business, personnel, training or other non-IM/IT scope, must be integrated into The Army CIO policies for the enterprise.

Initiatives	Milestones	Lead	Support
1.3.1 Develop appropriate AKM policies.	Oct 01 Ongoing	Army CIO	AKM Working Group
1.3.2 Develop and issue guidance for integrating Web-based electronic information and services throughout The Army	Sep 01	Army CIO	AKM Working Group/ LIWA
1.3.3 Develop an AKM awards program recognizing innovation, efficiencies, and collaboration.	Apr 02	Army CIO	AKM Working Group
1.3.4 Develop a strategy for implementing functional portals at MACOMs and installations in conjunction with The Army Enterprise Portal Architecture.	Aug 02	Functional/ Organizational Lead	Army CIO/AMC (CECOM)/ FORSCOM(ASC)

Table 3 Objective 1.3



This goal focuses upon infusing knowledge management principles and concepts into the work efforts of the enterprise. It does this in four ways. First, it formally establishes and nurtures knowledge centers at HQDA and MACOM levels and at a higher level, it supports the establishment of DoD Knowledge Centers linked to The Army portal, AKO, for convenient access. Second, the goal promotes and encourages KM information exchange with industry, academia, and professional societies to serve as models of excellence. Third, the goal transfers knowledge enterprise-wide across functional lines. Fourth, this goal establishes and fosters Communities of Practice. Knowledge Centers, partnerships, and Communities of Practice are all examples of change catalysts creating a knowledge-based organization.

This objective leverages existing Army knowledge centers and fosters their continued development. It also supports the creation of new knowledge centers at DoD, HQDA, and MACOM levels which facilitate the transfer of knowledge for superior decision-making. Army Knowledge Centers such as The Army Center for Lessons Learned assist in these efforts by fostering Centers of Excellence throughout The Army.

Initiatives	Milestones	Lead	Support
2.1.1 MACOM report to Army CIO summary review of KM initiatives and Best Business Practices	Oct 1 01	Army CIO	MACOMs
2.1.1 Establish an ODISC4 Knowledge Center.	Oct 01	Army CIO	Industry Partners
2.1.2 Conduct Inaugural KM Symposium.	May 01 Annually	TRADOC (CALL)	Army CIO
2.1.3 Provide tools, techniques, methods, and lessons learned to Army Knowledge Centers.	May 02	Army CIO	Functional/ Organizational Leads
2.1.4 Publicize successes and lessons learned of the Knowledge Centers.	Dec 01	Army CIO	Functional/ Organizational Leads
2.1.5 Establish Communities of Practice.	Jul 02	Functional/ Organizational Leads	Army CIO
2.1.6 Publicize successes of the Communities of Practice.	Dec 02	Army CIO	Functional/ Organizational Leads
2.1.7 Develop IT Investment Strategy Knowledge Center	Aug 01	DISC4	
2.1.8 Link Personnel Leader Community Knowledge Center	Sep 01	DCSPR	
2.1.9 Link Classified legal site	Jan 02	OTJAG	

Table 4 Objective 2.1

This objective seeks KM partners to serve as successful models for The Army. This ensures a quality KM program. Partners include the best in business, academia, and professional societies. This goal includes pursuing HQDA membership in highly recommended associations and organizations that practice and promote knowledge management. Close participation and partnering with The Army Science Board for example, has provided The Army focus on KM challenges for the tactical environment.

Initiatives	Milestones	Lead	Support
2.2.1. Determine feasibility of establishing memberships in international and national KM societies and organizations and actively participate.	Oct 01	Army CIO	
2.2.2 Share and exchange information with established KM leaders in academia, government, and business to establish and develop AKM.	Oct 01	Army CIO	Selected Partners

2.2.3 Adopt best KM practices from business and government.	Ongoing	HQDA	Army CIO
2.2.4 Continue KM relationships with the Federal CIO Council, E-Gov, KM Consortium, etc.	Ongoing	Army CIO	Selected Partners
2.2.5 Integrate the findings of The Army Science Board KM panel into AKM.	Oct 01	Army CIO	ASB

Table 5 Objective 2.2

Knowledge shared across functional lines fosters superior decision-making. For the right knowledge to be at the right place, at the right time, functional and organizational processes must be streamlined/consolidated and Web-enabled. Web-enabling a number of applications and legacy systems achieves efficiencies, security, a common look and feel, and promotes the ability to easily use a system anywhere and systematically transfer knowledge across functional lines. In doing so, KM changes old ways of doing business, breaks down stovepipes, and provides real time information to decision-makers.

Initiatives	Milestones	Lead	Support
2.3.1 Use KM methods and technology in streamlining and reengineer functional and organizational business processes.	Dec 01 Ongoing	Functional/ Organizational Leads	Army CIO
2.3.2 Integrate SOMARDS, SIFS, PROBE, SABERS, and CEFMS into the Data Sharing Initiative-Financial Management (DSI.FM).	Mar 02	Army CIO	ASA(FM&C)/ DCSPRO/ARNG/ COE/AMC
2.3.3 Integrate The Army Flow Models functional components of Force Structure, Logistics, Personnel, Installation, and Costing into a seamless and interoperable environment.	Oct 01	Army CIO	Functional/ Organizational Leads
2.3.4 Maximize the role of Army librarians as knowledge brokers to maximize knowledge sharing across functional lines.	Ongoing	Army CIO	ODCSPER
2.3.5 Access business and personal information via AKO			
2.3.5.1 Deliver Advice of Travel Payments Online	Aug 01	DFAS	
2.3.5.2 Deliver Official personnel File Online	Oct 01	ODCSPER	
2.3.5.3 Deliver Official Photo Online	Dec 02	ODCSPER	
2.3.5.4 Deliver LES Online	Feb 02	DFAS	
2.3.5.5.Create Consolidated View Of Publications	Feb 02	Admin Assist	
2.3.5.6 Provide Access to Digital Army Library System	Apr 02	ODCSPER	

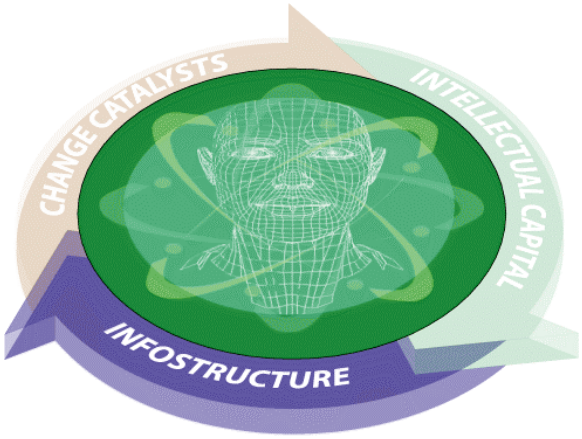
2.3.5.7 Track Security Clearances Online	May 02	ODCSPER	
2.3.5.8 Establish Army Acquisition Portal with link to AKO	Nov 01	ASA(ACT)	Army CIO
2.3.5.9 Establish AMC Portal with link to AKO	Nov 01	AMC	Army CIO

Table 6 Objective 2.3

This objective establishes communities of practice. Communities of practice exist to share experiences, relate best practices, convey lessons learned, and highlight successes in KM. They encourage knowledge sharing. Communities of practice can exist virtually or physically. In many cases, communities of practice leverage technologies to meet virtually, but then meet face-to-face periodically to strengthen relationships and levels of trust. Continued collaboration and partnerships with Army Knowledge Centers of Excellence like the Center for Lessons Learned, can ensure success of the AKM.

Initiatives	Milestones	Lead	Support
2.4.1 Participate as IT Representative on Army Business Initiatives Task Force	Ongoing	Army CIO	
2.4.2 Work With OSD to Identify KM Tools for Enterprise Software Licenses	Dec 01	Army CIO	OSD

Table 7 Objective 2.4



This goal seeks to manage The Army's IT infrastructure at an enterprise level. Doing so can reduce costs, improve security, provide better configuration management, and facilitate workforce strategies in line with The Army Transformation.

New paradigms must be adopted which enable The Army to manage the infostructure as a common service, potentially through central funding.

To streamline the systems, current and future technological innovations must be effectively applied to The Army's business processes. Then the system must use an Army-wide standard architecture managed from an enterprise perspective to ensure interoperability.

The Army must enforce standards and build systems to the open systems objective architecture. Systems that do not comply with The Army Enterprise Architecture (AEA) and the Global Information Grid (GIG) must be eliminated and development proposals for systems that do not conform to the AEA must not be approved. To ensure this, the IT capital planning process must include an evaluation of each proposed IT budget expense for conformance to the architecture.

Initiatives	Milestones	Lead	Support
3.1.1 Develop the architecture concepts and strategies for AKM within the current AEA.	Nov 01	Army CIO	
3.1.2 Make all architecture products available on the AKO website.	Dec 01	Army CIO	TRADOC ASA (ALT)
3.1.3 Develop an online information resource at www.us.army.mil defining and documenting an evolving strategy and a set of tasks for the effective and well-coordinated use of extensible Markup Language (XML) to support Army functions.	Mar 02	Army CIO	AKM Working Group/DISA

Table 8 Objective 3.1

As Figure 5 demonstrates, today's environment results in disparate systems, redundancies, security vulnerabilities, and wasted resources.

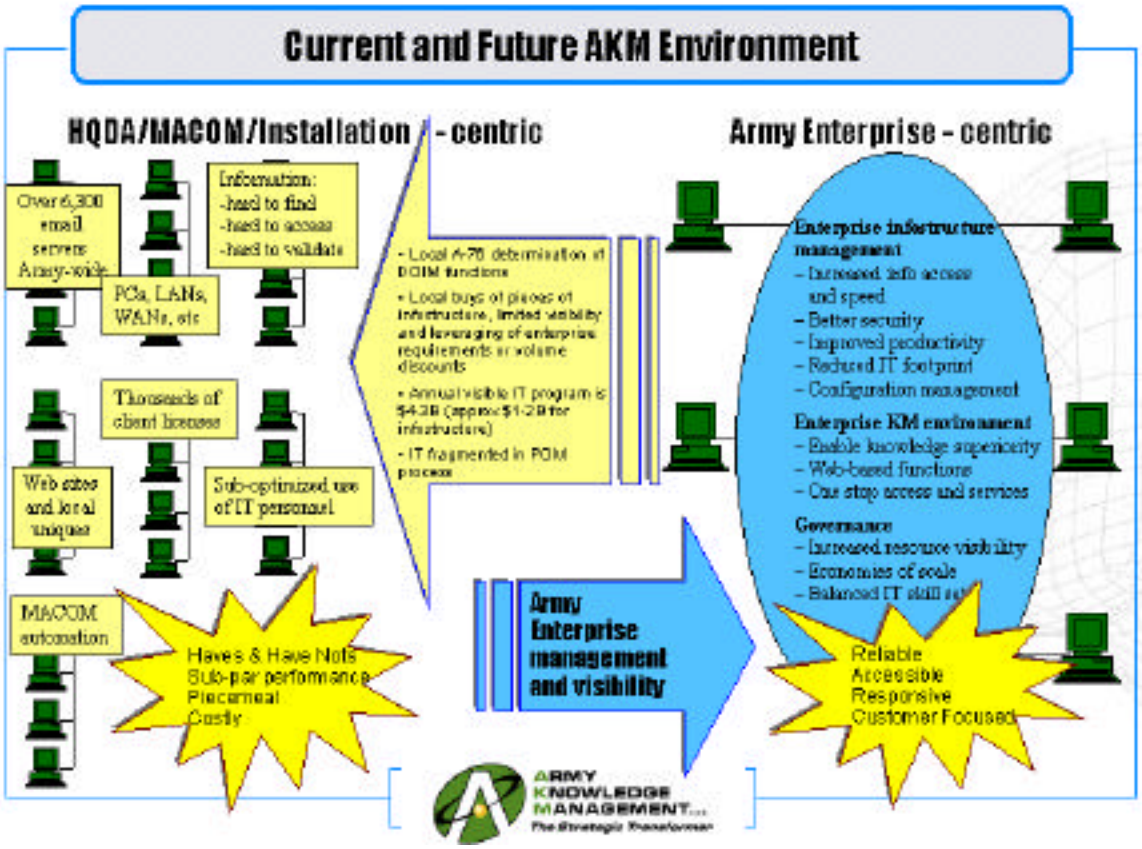


Figure 5 Contrast the current and future IT footprint

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Tomorrow's environment reduces vulnerabilities, provides better fail-over capabilities, improves service levels, and provides a potential to reduce resource requirements.

Initiatives	Milestones	Lead	Support
3.2.1 Establish an enterprise Operations and Management information technology authority	Oct 01	Army CIO	
3.2.2 Infostructure Consolidation			
3.2.2.1 RFI to Industry	Aug 01	Army CIO	DISA
3.2.2.2 Receive Industry Responses	Nov 01	Army CIO	DISA

3.2.2.3 Evaluate Industry Responses	Dec 01	Army CIO	DISA
3.2.2.4 Complete Business Case Analysis	Feb 02	Army CIO	DISA
3.2.2.5 Determine Coarse of Action for Consolidation	Feb 02	Army CIO	DISA
3.2.2.6 Prepare RFP	May 02	Army CIO	DISA
3.2.2.7 RFP to Industry	Jun 02	Army CIO	DISA
3.2.2.8 Industry Reponses to RFP	Aug 02	Army CIO	DISA
3.2.2.9 Source Selection	Nov 92	Army CIO	DISA
3.2.2.10 Contract Award	Dec 02	Army CIO	DISA
3.2.3 Develop a target infostructure architecture that is browser based.	Jan 02	Army CIO	DISA
3.2.4 Establish concept plan for MDW pilot.			
3.2.4.1 Finalize Concept Plan for Consolidation Pilot	Sep 01	Army CIO	ACSIM
3.2.4.2 Comprehensive Pilot Proof of Concept	Feb 02	Army CIO	ACSIM
3.2.5 Army infostructure consolidation			
3.2..5.1. MACOMS and HQDA report infostructure baseline and consolidation initiatives to CIO	Sep 01	Army CIO	MACOMS, HQDA
3.2.5.2 Draft Enterprise strategy	Nov 01	Army CIO	MACOMs, HQDA
3.2.5.3 Consolidation at MACOMs and HQDA	Oct 02	Army CIO	MACOMS, HQDA
3.2.6 Develop a plan to accelerate the modernization of sustaining base infostructure (communications pipes and bandwidth).	Dec 01	Army CIO	DISA
3.2.7 Implement the Windows 2000/Active Directory initial operational capability.	Jun-Dec 01	Army CIO	FORSCOM (ASC) AMC (CECOM/ISEC)
3.2.7.1 Populate Pilot Active Directory Test Population	Jul 01	Army CIO	
3.2.7.2 Conduct Functional Tests with Data Collection	Aug 01	Army CIO	
3.2.7.3 Conduct Data Analysis and Refine Architecture	Oct 01	Army CIO	
3.2.7.4 Initiate Phase II Pilot (Exchange)	Nov 01	Army CIO	
3.2.7.5 Conduct Functional Tests and Data Collection (Exchange)	Feb 02	Army CIO	
3.2.7.6 Conduct Data Analysis and Refine Architecture (Exchange)	Mar 02	Army CIO	
3.2.7.7 Initiate Win2K, Active Directory and Exchange 2000 IOC	Mar 02	Army CIO	

Table 9 Objective 3.2

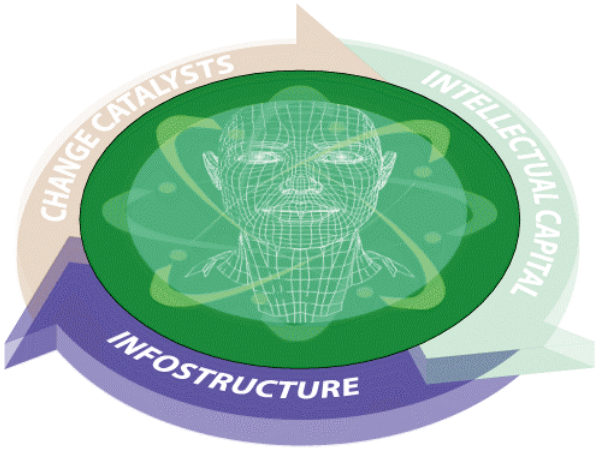
Information assurance procedures and processes protect and defend enterprise information and information systems by ensuring availability, integrity, authenticity, confidentiality, and non-repudiation. This includes providing for restoration of information systems by incorporating protection, detection, and reaction capabilities. Two critical components of The Army's strategy are the implementation of the Common Access Card (CAC) and Biometrics Technology.

The CAC is the first DoD wide implementation of smart card technology and is poised for introduction throughout The Army in FY01 as part of the first DoD program to deploy smart-card technology on an enterprise-wide basis. The multi-function CAC replaces the current teslin identification (ID) card as the standard credential for personnel identification within the DoD and will be used to gain physical access to buildings and facilities. The CAC also is destined to become the carrier, or token, for the Public Key Infrastructure (PKI) certificates that will be required to access DoD information systems and networks. The personal identification and authentication certificates carried on the CAC will substantially improve computer security and the information assurance posture of The Army and DoD by providing a digital signature and data encryption capability. The CAC/PKI is critical to The Army's information assurance strategy because it offers a means of authentication, data integrity, non-repudiation, and confidentiality of data that other technologies do not.
Biometrics technology insertion in DoD information and information-based systems starting in FY01 provides a means of establishing positive access control. Biometrics are measurable physical or behavioral characteristics used to recognize or verify the claimed identity of an individual and may be designed to overlay and replace the use of passwords, which can be lost or stolen. When used with other enabling technologies such as smart cards or PKI certificates on tokens carried by individuals, biometrics provide positive identity for the person desiring access to facilities or information systems.

Initiatives	Milestones	Lead	Support
3.3.1 Establish a CAC/PKI Configuration Management Process targeted at evaluating and prioritizing applications to be CAC/PKI enabled.	Jun 01	Army CIO	PEO STAMIS
3.3.2 Develop a CAC/PKI Implementation Plan	Jun 01	Army CIO	PEO STAMIS
3.3.3 Develop an Army CAC/PKI outreach strategy focused on educating business process owners on the benefits of implementing public key technology in their current business processes.	Jul 01	Army CIO	PEO STAMIS (PM SET-D)
3.3.4 Establish a CAC/PKI help desk to provide support to Army business process owners and material developers in the implementation of PKI.	Aug 01	Army CIO	PEO STAMIS (PM SET-D)
3.3.5. Publish a policy on Army Public Key Enabling (PKE) of Applications in The Army.	Jan 02	Army CIO	
3.3.6 Insert biometrics technologies and services into The Army products and solutions as an enhancement to existing processes.	Jan 02	Army CIO	
3.3.7 Ensure availability of biometrics technology in the Department of The Army.	Jan 02	Army CIO	

Table 10 Objective 3.3

This goal focuses on the infostructure necessary to develop and maintain a scalable Knowledge Management System (KMS) for the enterprise. Applications of a KMS include a portal, content management software, collaborative tools, and an expertise and people locator. The key, however, to a successful KMS is a robust, scalable portal that provides a single port of entry to the various applications valuable to the enterprise. The Army has an excellent start on a KMS through its existing portal, Army Knowledge Online (AKO), which exists on both the NIPRNET and SIPRNET (AKO-S). AKO can be scaled to accommodate customer demand and expanded to include expertise location, data warehouses, knowledge centers, and document repositories.



This expands AKO to accommodate an estimated 1.2M customers. Customers include Active Duty military personnel, Army Reserves, National Guard, Department of The Army civilians, and industry partners. It also capitalizes upon advancing knowledge management technologies for expertise location, increased collaborative capabilities, enhanced ability to find people, and access to rich, value-added enterprise content.

Initiatives	Milestones	Lead	Support
4.1.1 All Army active duty military, civilian, Army National Guard, and Army Reserve individual will have AKO account	01 Oct 01	Army CIO	Army CTO
4.1.2 Expand AKO hardware, software and personnel support to 1.2M customers.	Aug 01	Army CIO	Industry Partners
4.1.3 Deploy The Army White Pages.	Mar-02	Army CIO	MACOMs/ ODCSPER
4.1.4. Expand/enhance AKO portal capabilities			
4.1.4.1 Implement 3rd Generation COTS (Instant Messaging, Chat)	Aug 01	Army CIO	
4.1.4.2 Develop Portal Management Plan	Oct 01	Army CIO	
4.1.4.3 Implement 3rd Generation COTS – SiprNet	Mar 02	Army CIO	
4.1.4.4 Develop Enterprise CONOPS/O&M Transition Plan	Apr 02	Army CIO	
4.1.5 Develop The Army Acquisition portal and link to AKO.	Nov 01	Army CIO	
4.1.6 Expand/enhance AKO-S portal capabilities (push technology, enhanced web-mail, group calendaring, PKI implementation, single sign-on and authentication.)	Feb 02	Army CIO	
4.1.7 Determine Best Army Enterprise Email Solution.	Sep 01	Army CIO	Industrial Partners
4.1.8 Develop Web-based email pilot for 5,000 users.	Nov 01	Army CIO	Industrial Partners

Table 11 Objective 4.1

To leverage the early success of AKO, expansion of applications for functional communities on the portal becomes paramount. Such applications include personnel, finance, library, and medical services.

To achieve true self-service, the functional communities must examine current processes in light of existing technologies and reengineer processes for the web environment to achieve cost reductions and save time. Army commands must also reevaluate information they provide on the public Internet versus The Army intranet via AKO. Then, they must establish local strategies to provide soldiers, civilians, and families with internal Army information on The Army intranet.

Initiatives	Milestones	Lead	Support
4.2.1 “Webify” and streamline applications and link to AKO	Jul 02	Army CIO	HQDA; MACOMs
4.2.2 Post “Best Practices” on AKO	Nov 01	Army CIO	HQDA, MACOMs
4.2.3 Identify opportunities for rapid development of self-service applications that make transactions seamless across all levels of The Army.	Aug 01	Functional & Organizational Leads	Army CIO
4.2.4 Create Army partnerships to enrich and promote initial entry points to self-service applications and information on AKO.	Oct 01	Army CIO	HQDA; MACOMs
4.2.5 Include virtual communities of practice/ knowledge centers on the AKO portal site (www.us.army.mil)	Oct 01	Army CIO	HQDA; MACOMs
4.2.6 Develop a plan to improve business process through electronic routing of Army forms and publications through the AKO portal.	Dec 01	USAPA	Army CIO Functional & Organizational Leads
4.2.7 Develop AKO Users Guide	Dec 01	Army CIO	

Table 12 Objective 4.2

The Army must evaluate, test, and deploy a wide range of applications using collaborative technologies including net-conferences, white-boards, document sharing, database sharing, threaded discussion groups, expertise locators, and other technologies as they develop and mature. Where possible, The Army will adhere to established industry standards when choosing a collaborative tool.

With collaborative tools accessible on AKO, the enterprise expands its capability to collaborate horizontally and vertically to break-down costly stove pipes of information and to enable the free flow of information to decision makers. This process is absolutely critical in transforming The Army to a knowledge-based organization that renders decisions in a fast-paced environment with the best information available.

Initiatives	Milestones	Lead	Support
4.3.1. Facilitate an ongoing exchange of ideas and information between industry leaders and The Army.	Oct 01	Army CIO	HQDA, MACOMs
4.3.2. Expand the AKO collaborative software infostructure to support communities of practice.	Dec 01	Army CIO	AMC (CECOM)
4.3.3. Conduct training on use of collaboration tools.	Apr 02	HQDA, MACOMs	Army CIO
4.3.4. Establish criteria to measure organizational achievement of KM initiatives.	Jul 02	Army CIO	

Table 13 Objective 4.3

Today's Army is harnessing its human capital and defining the requirements for a knowledge-based organization in ways that call upon rapid information access and expanded information sharing. The complexity and impact of this new approach will fundamentally reshape every aspect of work and life. In a knowledge organization the context shifts from individual domains of practice to communities of practice that generate and share knowledge.

A knowledge-based organization demands new organizational definitions and disciplines to help leaders respond effectively to new challenges and create new opportunities. Leaders must communicate their vision and expectations to build a framework for knowledge management that has a strong human capital infrastructure in which knowledge is shared across The Army organization.

Figure 6 shows the impact of this goal on The Army as AKM progresses

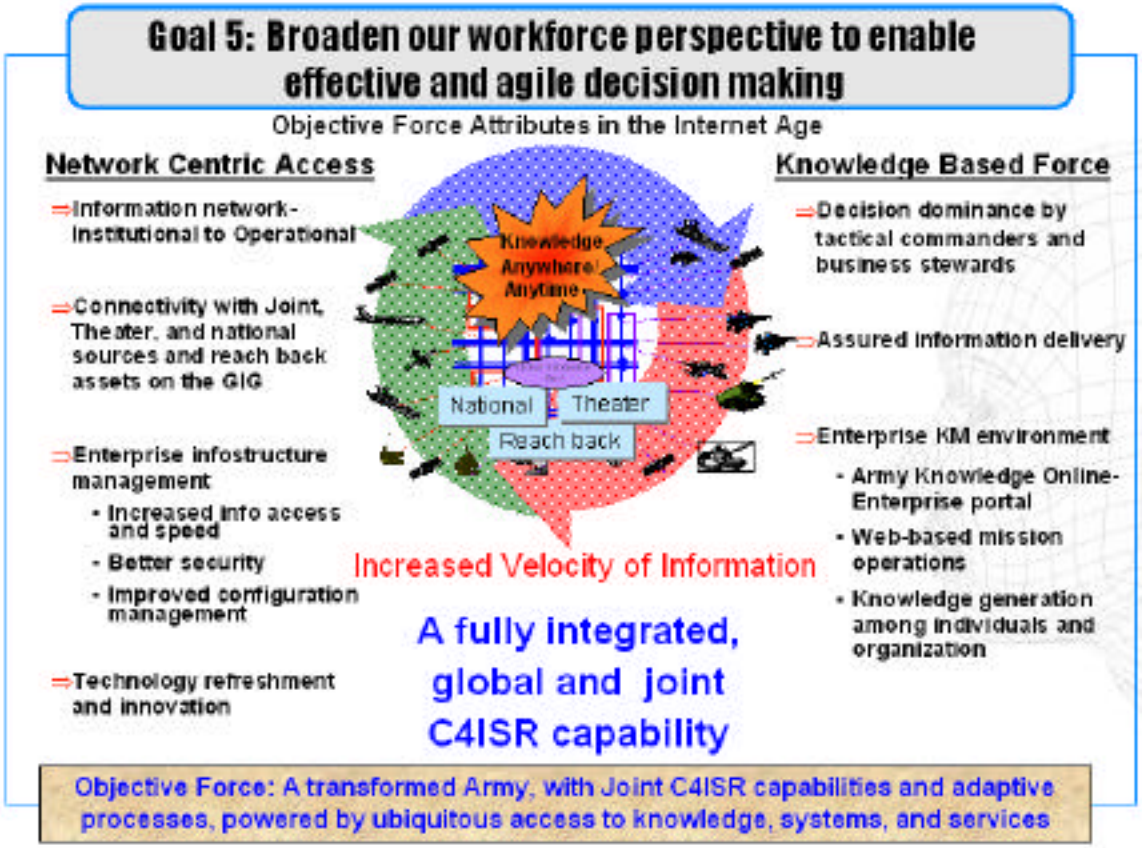


Figure 6 Harness Human Capital

The Army is shifting its focus from handling information to generating and managing a knowledge base that is aligned to The Army mission. The explosion of information technology is the single most significant impetus for harnessing human capital. As an enabler of knowledge management, technology creates a demand for a new breed of IT professionals. These professionals must have broad-based skills, be adaptable to new ways of work, and be able to handle rapidly changing technology to meet customer needs.

Initiatives	Milestones	Lead	Support
5.1.1 Revise ITM ACTEDS Training Plan	Oct 01	ODISC4	ASA (M&RA
5.1.2 Integrate Federal CIO Core Competencies into training programs	Ongoing	ODISC4	
5.1.3 Build models for leadership and mentoring in a knowledge-based organization	FY 02	ODISC4, Selected Partners	

Table 14 Objective 5.1

Implementing knowledge management effectively requires a transformation of The Army's most valued asset – its human capital. This transformation requires proactive career development initiatives designed to ensure the development of ITM professionals with broad-based skills and competencies:

Initiatives	Milestones	Lead	Support
5.2.1 Establish Individual Development Plans (IDP) guidelines	Jan 02	ODISC4	ASA (M&RA)
5.2.2 Build cross-functional competencies that encourage knowledge sharing	Dec 01	ODISC4	ASA (M&RA), Selected Partners
5.2.3 Modernize career development practices	Dec 01	ODISC4	ASA (M&RA)
5.2.4 Provide Education and Training Opportunities	Jun 02	ODISC4	

Table 15 Objective 5.2

Key to the success of a knowledge-based organization is continuous learning. Accordingly, education, training, and professional development opportunities will provide ITM professionals with a global perspective, enable them to embrace and lead change, and make them adaptable to new environments and new ways of doing business.

Information Technology holds great promise as an enabler of The Army's transformation into a knowledge-based organization. For that promise to be realized, military and civilian IT managers must possess the leadership, business, and technology competencies required to support Army's global information mission.

Initiatives	Milestones	Lead	Support
5.3.1 Prepare future leaders through ITM/CIO/KM centric programs	Feb 02	ODISC4	ASA (M&RA), Selected Partners
5.3.2 Expand options for Training with Industry (TWI)	Mar 02	ODISC4	ASA (M&RA), Selected Partners
5.3.3 Extend customer outreach through distance learning and other venues	Jan 02	ODISC4	ASA (M&RA), TRADOC

Table 16 Objective 5.3

Knowledge-centric workers need broad-based skills, multi-functional competencies, and a holistic view of their place within The Army enterprise. The Army can attract global thinkers from many disciplines, including business, technology, information science, and information management. Recruitment and retention strategies can include monetary incentives, workplace flexibilities, and education opportunities.

Initiatives	Milestones	Lead	Support
5.4.1 Report innovative ideas and initiatives for KM based training and reshaping workforce	31 Dec 01	Army CIO	HQDA, MACOMs
5.4.2 Maximize modern hiring practices and incentives	Ongoing	ASA (M&RA), ODISC4	
5.4.3 Establish cross-training programs in KM and business	May 02	ODISC4	ASA (M&RA), Selected Partners
5.4.4 Revitalize intern and leader programs	FY 02	ODISC4	ASA (M&RA)
5.4.5 Enhance career opportunities for Army Acquisition and Technology Workforce	Jun 02	ASA (ALT)	ODISC4
5.4.6 Convert ITM Positions to Job Series 2210	Dec 01	ASA (MRA)	ODISC4
5.4.7 Initiate AIM HIGH Leader Development Program at HQDA	Oct 01	ODISC4	ASA (MRA)
5.4.8 Webify Program and Course Announcements on *ITMCareers*	Jan 02	ODISC4	
5.4.9 Participate in DoD Information Assurance Scholarship Program	Sep 01	ODISC4	ASA (MRA)
5.4.10 Examine Recruitment and Retention Incentives for Warrant Officer 251A an Officer Functional Area 53	FY 02	Signal Center	

Table 17 Objective 5.4

New technologies are constantly emerging to enable information and business processes. Leveraging IT to reach the many, streamline processes, and provide rapid access will support best practices in an electronic business environment.

Initiatives	Milestones	Lead	Support
5.5.1 Develop and promote world-wide use of ***ITMCareers*** web site	Ongoing	ODISC4	
5.5.2 Apply new technologies to promote best e-practices	Ongoing	ODISC4	ASA (M&RA), Selected Partners

Table 20 Objective 5.5

Acquisition Results Act of 1998. The purpose of this Act is to improve the performance of the Federal procurement system by managing for results and by improving the capability of the federal acquisition workforce to achieve the desired results.

Chief Financial Officers (CFO) Act of 1990 (Public Law 101-576). The CFO Act provides a framework for improving federal government financial systems. It centralizes within OMB, through the Deputy Director for Management and the Office of Federal Financial Management, the establishment and oversight of federal financial management policies and practices and requires OMB to prepare and submit to Congress a government-wide, 5-year financial management plan. The act also requires the 24 major agencies to have CFOs and deputy CFOs and lays out their authorities and functions. Further, the act sets up a series of pilot audits under which certain agencies are required to prepare agency wide financial statements and subject them to audit by the agencies' inspectors general.

Clinger-Cohen Act of 1996 (Public Law 104-106). This law is intended to improve the productivity, efficiency, and effectiveness of federal programs through the improved acquisition, use, and disposal of IT resources. Among other provisions, it (1) encourages federal agencies to evaluate and adopt best management and acquisition practices used by both private and public sector organizations, (2) requires agencies to base decisions about IT investments on quantitative and qualitative factors associated with the costs, benefits, and risks of those investments using performance data (such as reduced costs, improved employee productivity, and higher customer satisfaction) to demonstrate how well the IT expenditures support improvements to agency programs, and (3) requires executive agencies to appoint CIOs to carry out the IT management provisions of the act and the broader information resources management requirements of the Paperwork Reduction Act. The Clinger-Cohen Act also streamlines the IT acquisition process by eliminating the General Service Administration's central acquisition authority, placing procurement responsibility directly with federal agencies, and encouraging the adoption of smaller, modular IT acquisition projects.

Computer Security Act of 1987 (Public Law 100-235, as amended by Public Law 104-106). This law addresses the importance of ensuring and improving the security and privacy of sensitive information in federal computer systems. The act requires that the National Institute of Standards and Technology develop standards and guidelines for computer systems to control loss and unauthorized modification or disclosure of sensitive information and to prevent computer-related fraud and misuse. The act also requires that all operators of federal computer systems, including both federal agencies and their contractors, establish security plans.

Copyright Act. It protects the intellectual property of authors and creators as contained in works (print and non-print) and includes the provisions of Fair Use.

Federal Acquisition Streamlining Act (FASA) of 1994. Law designed to overhaul the cumbersome and complex federal procurement system. Among the many aspects of this law, it eliminates most paperwork and record keeping requirements for acquisitions below $100,000 and allows direct "micro-purchases" of items below $2,500 without competitive quotations or compliance with Buy American Act and certain small business requirements.

Federal Financial Management Improvement Act of 1996 (Public Law 104-208). This Act requires that agency financial management systems comply with federal financial management system requirements, applicable federal accounting standards, and the *U.S. Government Standard General Ledger* (SGL) in order to provide uniform, reliable, and more useful financial information. The act requires that auditors for each of the 24 departments and agencies named in the CFO Act report, as part of their annual audits of the agencies' financial statements, whether the agencies' financial management systems comply substantially with federal financial management systems requirements, applicable federal accounting standards, and SGL at the transaction level. The act also requires that GAO report on its implementation annually.

Freedom of Information Act of 1966. The federal law that establishes the public's right to request existing records from federal government agencies. Anyone can file a FOIA request, including US citizens, foreign nationals, organizations, universities, businesses and state and local governments. Organizations required to submit to FOIA requests include the executive branch departments, federal agencies, including federal regulatory agencies, and federal offices.

Federal Managers' Financial Integrity Act (FMFIA) of 1982 (Public law 97-255). FMFIA requires agencies to establish internal accounting and administrative controls in compliance with standards established by the Comptroller General. The act also requires that OMB establish, in consultation with the Comptroller General, guidelines that the agencies shall follow in evaluating their systems of internal accounting and administrative controls.

Goldwater-Nichols Act of 1986. This law defines the duties of the Secretary of Defense and his function within the chain of command including authority over the Service Secretaries. The act designates the Chairman of the Joint Chiefs of Staff (JCS), who can now serve three terms, as the principal military advisor to the President, the Secretary of Defense and the National Security Council and creates the position of vice chairman. It reduces significantly the role of the corporate JCS as an entity. The JCS members are still military advisors, and any individual member may submit individual advice when that member disagrees with the Chairman. The Chairman now has a more direct involvement in the preparation of strategic plans, contingency plans and net assessments. He provides advice to the Secretary on other important issues such as programs and budgets and doctrine for the joint employment of forces. He coordinates with the Service Secretaries on a wide range of issues, including training and education of the armed forces.

Government Information Security Reform (P.L. No. 106-398, Div. A, Title X, subtitle G). This legislation amends 44 U.S.C. Chapter 35 by enacting a new subchapter on "Information Security". The Security Act requires the establishment of agency wide information security programs, annual agency program reviews, annual independent evaluations of agency programs and practices, agency reporting to OMB, and OMB reporting to Congress. The Act covers programs for both unclassified and national security systems, but exempts agencies operating national security systems from OMB oversight. The Security Act is to be implemented consistent with the Computer Security Act.

Government Management Reform Act of 1994 (Public Law 103-356). This legislation expands the requirement for a fully audited financial statement under the CFO Act to 24 agencies and components of federal entities designated by the Office of Management and Budget. The act requires the Department of the Treasury to produce a consolidated financial statement for the federal government, which GAO is to audit annually.

Government Paperwork Elimination Act (GPEA) (P.L. No. 105-277, Div. C, Title XVII). GPEA requires that by 2003 federal agencies provide, where practicable, for the option of submitting, maintaining, or disclosing information in electronic form as substitute for paper, and for the use and acceptance of electronic signatures.

Government Performance and Results Act of 1993 (5 USC 306). The law holds federal agencies accountable for achieving program results by measuring program performance against program goals and requires agencies to publicly report their progress. The law improves Federal program effectiveness and public accountability by focusing upon results, service quality, and customer satisfaction. It also requires Federal managers to plan for meeting program objectives and provide annual performance plans covering each program activity set forth in the agency budget to the Director of the Office of Management and Budget.

Information Technology Management Reform Act of 1996. See Clinger-Cohen Act.

Paperwork Reduction Act (PRA) of 1995 (Public Law 104-13). PRA applies life cycle management principles to information management and focuses on reducing the government's information-collection burden. To this end, PRA designated senior information resources manager positions in the major departments and agencies with responsibility for a wide range of functions. PRA also created the Office of Information and Regulatory Affairs within the OMB to provide central oversight of information management activities across the federal government.

Privacy Act of 1974 (Public Law 93-579). The Privacy Act protects the privacy of individuals identified in information systems maintained by federal agencies by regulating the collection, maintenance, use, and dissemination of information by such agencies.

Rehabilitation Act of 1973. Sec. 408(b). This newly revised Section 508 imposes strict requirements for any electronic and information technology developed, maintained, procured, or used by federal agencies.

Federal CIO Council Strategic Plan, fiscal year 2001-2002. Washington, D.C.: October 2000. Available at http://cio.gov

General Services Administration. Performance Based Management: Eight Steps to Develop and Use Information Technology Performance Measures Effectively.

OMB Circular A-11, Preparation and Submission of Strategic Plans.

Army Transformation Campaign Plan, 1999

Army Regulation 11-32, Army Long-Range Planning System, 10 Jan 89.

Army Regulation 25-1, Army Information Management, 15 Feb 2000.

Army Regulation 70-1, Army Acquisition Policy, 15 Dec 97.

Army Regulation 380-19, Information Systems Security, 27 Feb 98.

Army Electronic Commerce Strategic Plan.

Defense Reform Initiative Directive #54 dealing with fielding web-based, shared data environments providing seamless, interoperable, real-time information. Addresses logistical environment primarily, but applies to all defense information. See www.defenselink.mil/dodreform/drids

Defense Systems Management College. Program Management 2000: Know the Way: How Knowledge Management Can Improve DoD Acquisition. Fort Belvoir, VA: January 2000.

Department of Defense, Chief Information Officer, Model CIO Study, December 2000. Available on the Internet at http://www.c3i.osd.mil/conference/pdffiles/ModelCIOStudy.html

GPRA Performance Plan for FY99, Department of Defense Annual Report to the President and Congress.

Joint Vision 2010. Chairman of the Joint Chiefs of Staff. Washington, D.C.: Joint Chiefs of Staff, 1995.

Joint Vision 2020. Chairman of the Joint Chiefs of Staff. Washington, D.C.: Joint Chiefs of Staff, 2000

National Military Strategy of the United States of America: A Strategy of Flexible and Selective Engagement. Chairman of the Joint Chiefs of Staff. Washington, DC: U.S.G.P.O., 1995.

U. S. Department of Defense. DoD Joint Technical Architecture (JTA). Available at http://jta.itsi.disa.mil

U.S. Department of Defense. Enterprise Document and Records Management Strategic Plan. Version 2. Washington, D. C.: October 1999.

U. S. Department of Defense. Office of the Assistant Secretary of Defense for Command, Control, Communications, and Intelligence (OASD/C3I). Advancing Knowledge Management in DoD: A Primer for Executives and Practitioners. Washington, D.C., 2001.

U. S. Department of The Army. Joint Technical Architecture-Army. Version 6.0. Available at http://arch-odisc4.army.mil

U. S. Department of The Army. Office of the Director for Information Systems, Command, Control, Communications, and Computers (ODISC4), Strategic and Advanced Computing Center. Army Knowledge Online (AKO) Strategic Plan. Version 2.0. Fort Belvoir, VA: December 1999.

U. S. Department of The Army. Office of the Director for Information Systems, Command, Control, Communications, and Computers (ODISC4). Information Technology Management Career Program-34, Strategic Plan, 2000-2005. Washington, D. C., September 2000.

U. S. Army. Office of the Chief of Staff and Office of the Secretary of The Army. The Army Vision: Soldiers on Point for the Nation. Washington, D. C.: October 1999.

Security Policy: Guidance for Management of Publicly Accessible U. S. Army Websites, 30 November 1998. Available at http://www.army.mil/webmasters/DA_web_guidance.htm

Davenport, Thomas H. and Laurence Prusak. Working Knowledge: How Organizations Manage What They Know. Boston, MA: Harvard Business School Press, 1998.

Dixon, Nancy M. Common Knowledge: How Companies Thrive By Sharing What They Know. Boston, MA: Harvard Business School Press, 2000.

Drucker, Peter F. The Effective Executive. Harper Business, 1985.

Ellis, Larry R. The Transformation Campaign Plan: The Tool to Transform The Army. Army Magazine, October 2000.

Frappaolo, Carl. Ushering in the Knowledge-Based Economy. Delphi Group.
Koulopoulos, Thomas. Corporate Instinct: Building a Knowing Enterprise for the 21st Century. John Wiley, 1997.

Koulopoulos, Thomas. Creating Corporate Instinct: Building a Knowledge Enterprise for the 21st Century. Delphi Group, 2000.

Neilson, Robert E. Dr. Interview with CHIPS, available via the Internet at http://www.chips.navy.mil/archives/01_winter/interview_with_dr.htm.

O'Dell, Carla S. If Only We Knew What We Know: The Transfer of Internal Knowledge and Best Practices. Free Press, 1998.

Schein, Edgar H. Kurt Lewin's Change Theory in the Field and in the Classroom: Notes Toward a Model of Managed Learning. Boston, MA: Massachusetts Institute of Technology, Sloan School of Management.

Senge, Peter M. The Fifth Discipline: The Art and Practice of the Learning Organization. Doubleday, 1994.

Shinseki, Eric K. The Army Transformation: A Historic Opportunity. Army Magazine, Vol. 50, No. 10.

Tiwana, Amrit. The Knowledge Management Toolkit. Upper Saddle River, N.J.: Prentice Hall, 2000.

Working Council of Chief Information Officers. Knowledge-Management Intranets: Basic Principles of Information Architecture. Corporate Executive Board, 2000.

Wycoff, Joyce. Transformation Thinking. New York: Berkley Books, 1995.

ACAG	Army Corporate Advisory Group
ACSIM	Assistant Chief of Staff for Installation Management
ACTEDS	Army Civilian Training, Education and Development System
AFM	Army Flow Model
AEA	Army Enterprise Architecture
A&I	Acquisition & Integration Directorate, DISC4
AKM	Army Knowledge Management
AKM WG	Army Knowledge Management Working Group
AKO	Army Knowledge Online
AKO-S	Army Knowledge Online SIPRNET
AMC	Army Materiel Command
AR	Army Regulation
ARNG	Army National Guard
ARSTAF	Army Staff
ASA (ALT)	Assistant Secretary of The Army (Acquisition, Logistics, and Technology)
ASA (FM&C)	Assistant Secretary of The Army (Financial Management & Comptroller)
ASA (M&RA)	Assistant Secretary of The Army(Manpower & Reserve Affairs)
ASC	Army Signal Command (FORSCOM)
BCA	Business Case Analysis
CAC	Common Access Card
CALL	Center for Army Lessons Learned (TRADOC)
CECOM	Communications and Electronic Command (AMC)
CINC	Commander in Chief
CIO	Chief Information Officer
CKO	Chief Knowledge Officer/Office
COE	Corps of Engineers
CP-34	Career Program – Information Technology/Management
CRD	Capstone Requirements Document
CSA	Chief of Staff Army
CY	Calendar Year
DA	Department of Army
DAS	Director of The Army Staff
CEFMS	Corps of Engineers Financial Management System
DFAS	Defense Finance and Accounting Services
DISA	Defense Information Systems Agency
DISC4	Director of Information Systems for Command, Control, Communications & Computers
DoD	Department of Defense
DCSPER	Deputy Chief of Staff for Personnel

DCSPRO	Deputy Chief of Staff for Programs
DSI.FM	Data Sharing Initiative Financial Management
e-Army	Electronic Army
e-Business	Electronic Business
e-Commerce	Electronic Commerce
e-Gov	Electronic Goverment
EB	Executive Board
FAR	Federal Acquisition Regulation
FASA	Federal Acquisition Streamlining Act
FORSCOM	Forces Command
FY	Fiscal Year
FYDP	Future Year Defense Program
GIG	Global Information Grid
GPEA	Government Paperwork Elimination Act
GPRA	Government Performance and Results Act
GS	General Schedule
HQDA	Headquarters, Department of The Army
HTML	Hyper Text Markup Language
IA	Information Assurance
IDM	Information Dissemination Management
IM	Information Management
ISEC	Information System Engineering Command (AMC)
IT	Information Technology
ITM	Information Technology Management
JAGC	Judge Advocate General Corps
JV2020	Joint Vision 2020
KSF	Key Success Factors
KM	Knowledge Management
KMS	Knowledge Management System
LANs	Local Access Network
LES	Leave and Earning Statement
LIWA	Land Information Warfare Activity
LO	Line of Operation
MACOM	Major Commands
MDW	Military District of Washington
MIM	Mission Information Management
MOS	Military Occupational Specialty
NG	National Guard (Army)
NIPRNET	Non-Classified Internet Protocol Router Network
NMS	National Military Strategy
NSSA	National Space Security Architect
ODCSOPS	Office of the Deputy Chief of Staff, Operations & Plans
OPM	Office of Personnel Management
P&A	Program & Architecture Directorate, DISC4
PAED	Program Analysis & Evaluation Directorate

PAO	Public Affairs Office
PCs	Personal Computers
PEO STAMIS	Program Executive Office, Standard Army Management Information Systems
PEO C3S	Program Executive Office for Command, Control, Communications Systems
PERSCOM	Personnel Command
PKE	Public Key Enabling
PKI	Public Key Infrastructure
PM SET-D	Project Manager Secure Electronic Transaction - Device
POM	Program Objective Memorandum
PPBES	Planning, Programming, Budgeting and Execution System
PROBE	Program Optimization & Budget Evaluation
RFI	Request For Information
SA	Secretary of The Army
SABERS	State Accounting Budgeting Expenditure and Reservation System
SACC	Strategic and Advanced Computing Center, DISC4
SES	Senior Executive Service
SIPRNET	Secret Internet Protocol Router Network
SIFS	Standard Industrial Fund System
SOMARDS	Standard Operation and Maintenance Army Research and Development System
TCO	Total Cost of Ownership
TRADOC	Training and Doctrine Command
TWI	Training With Industry
USAPA	United States Army Publishing Agency
WANs	Wide Area Network
XML	eXtensible Markup Language

Activity: A process, function or task that occurs over time and has recognizable results. Activities combine to form business processes.

Algorithm: A formula or set of steps for solving a particular problem. To be an algorithm, a set of rules must be unambiguous and have a clear stopping point. Algorithms can be expressed in any language, from a natural language like English to a programming language like Java.

Analysis: A process of manipulation and accessing data to turn data into knowledge.

Army Enterprise Directory: A single location for applications and users to quickly find information—dramatically increased information sharing (locating), reduced cost in application development, and database and/or directory administration.

Army Knowledge Centers: A central Web-based repository that stores, organizes, and shares individual expertise and organizational information, such as documents, databases, and workflow systems and best practices. Exponential power occurs when individuals and organizations use the knowledge center's collaboration and self-service capabilities to rapidly and accurately access and analyze enterprise information. World-class knowledge centers include those at Joint Forces Command, PEO C3S, and The Army JAG Corps.

Army Knowledge Management: The Army's approach to knowledge management. AKM integrates and establishes a systematic approach to identifying, managing, and sharing enterprise-wide information assets. See also the Knowledge Management definition below.

Army Knowledge Online (AKO): The Army's Enterprise Portal. It serves as a single point of entry for Army Knowledge resources on The Army NIPRNET.

Army Knowledge Online–SIPRNET (AKO-S): Army's enterprise portal for knowledge classified at the secret level.

Artificial Intelligence: Computer hardware and software packages that try to emulate human intelligence in order to solve problems using reasoning and learning. There are various techniques such as expert systems that have historical roots in artificial intelligence.

Balanced Scorecard System: Method of measuring performance of a firm beyond the typical financial measures. Links corporate goals and direct performance measures in a framework specific to a firm, and is one method of measuring the impact of knowledge management.

Baseline: The current condition that exists in a situation. It is usually used to differentiate between a current and a future representation.

Best Practices: Documented strategies and tactics used by business, government, and other organizations to achieve specific results, typically better ways of operating, reducing costs of a function, or achieving superior performance.

Browser Based: A web-based application.

Business Case Analysis: A process that supports planning and decision-making–including decisions about whether to buy, which alternative to choose, and when to implement. Business cases are generally designed to answer the question," What will be the financial consequences if we choose X or do Y?" It also shows the expected cash flow consequences of the decision, over time, and it includes the rationale for quantifying benefits and costs. Critical success factors and significant risks will be discussed, if relevant.

Business Intelligence: A popularized, umbrella term introduced by Howard Dresner of the Gartner Group in 1989 to describe a set of concepts and methods to improve business decision making by using fact-based support systems. The term is sometimes used interchangeably with briefing books and executive information systems.

Business Objectives: Goals of the organization that can be measured in some quantitative way. (e.g. Decrease cost by 15%. Become the supplier with the lowest rate of returned products.)

Business Process Portal: Focuses on solving a particular business problem or manage a particular business function. Business process portals bring the right information to the right people at the right time to help them get their work done. A business process portal is a type of vertical portal.

Business Process Reengineering (BPR): A structured approach by all or part of an enterprise to improve the value of its products and services while reducing resource requirements. The transformation of a business process to achieve significant levels of improvement in one or more performance measures relating to fitness for purpose, quality, cycle time, and cost by using the techniques of streamlining and removing added activities and costs.

Collaboration: The use of technologies, especially those that utilize the Internet, to create a virtual environment to promote and support the exchange of knowledge at the right time and place to affect an action, solve a problem, and/or impact a better decision.

Collaborative Tools: Tools that enable sharing of knowledge across time and distance. These tools may enable both structured and free-flow sharing of knowledge and best practices. Transcripts of the use of these tools may be incorporated into a knowledge base for future use.

Community: A body of people having common rights, privileges, or interests.

Communities of Practice: The ways people naturally work together and use technologies to create a virtual environment to electronically bring together groupings of people centered on how they work so they share knowledge.

Content: The data, information, and knowledge (including processes and procedures), which are important to the organization.

Content management: Technologies that allow the capture and management of explicit experience. It allows people to capture, codify, and organize experiences and ideas in central repositories. A more general term than data management, content management includes structured and unstructured data.

Content mapping: Identifying and organizing a high-level description of the meaning contained in a collection of electronic documents.

Core Competencies: The complex set of skills, knowledge, and resources that span the organization, yield a sustainable competitive advantage in the marketplace, and permeate the organization's culture. Core competencies evolve over time and are based on specific "know-how."

Core Rigidity: Opposite of core competency. Defining any core competency too narrowly may turn it into a core rigidity. Core rigidities are unquestioned assumptions about an organization's products, policies, or positioning, which lead to complacency and inhibit innovation.

Corporate Knowledge: The collective body of experience and understanding of an organization's processes for managing both planned and unplanned situations.

Corporate Knowledge Management: The process whereby knowledge seekers are linked with knowledge sources and knowledge is transferred.

Customer Capital: The value of an organization's relationships with the people with whom it does business, or the value of its [the company's] franchise, its ongoing relationships with the people or organizations to which it sells.

Data: Set of discrete, objective facts about events. Data is transformed into information by adding value through context, categorization, calculations, corrections, and condensation. Data is facts and figures, without context and interpretation. Data + Context = Information.

Database: A collection of interrelated data, often with controlled redundancy, organized according to a schema to serve one or more applications. A database is generally considered to be structured data.

Data Mining: A class of database applications that looks for hidden patterns in a group of data. Data mining software can help retail companies find customers with common interests. The term is commonly misused to describe software that presents data in new ways. True data mining software doesn't just change the presentation, but actually discovers unknown relationships among the data.

Data Warehousing: A collection of data designed to support management decision-making. Data warehouses contain a wide variety of data that present a coherent picture of business conditions at a single point in time. Development of a data warehouse includes development of systems to extract data from operating systems plus installation of a warehouse database system that provides managers flexible access to the data. Data warehousing generally refers to many different databases across an entire enterprise.

Decision Support Systems (DSS): Interactive computer-based systems intended to help decision makers utilize data and models to identify and solve problems and make decisions. The system must aid a decision-maker in solving unprogrammed, unstructured (or "semi-structured") problems. The system must possess an interactive query facility, with a query language that is easy to learn and use.

Discontinuity of Knowledge: A phenomenon that occurs when experienced knowledge workers move from one position to another position (inside or outside an organization) without having adequate time or KM facilities to transfer their tacit knowledge to coworkers.

Enterprise Portal: A web site or service that offers a broad array of resources and services, such as e-mail, forums, search engines, on-line self-service applications, security, directory, profiling, taxonomy, application integration, content aggregation and publishing.

Enterprise-wide: An action, activity, program or effort such as a technology that is applicable across an entire organization such as The Army.

Entity: The representation of a set of real or abstract things (people, objects, places, events, ideas, combination of things, etc.) that are recognized as the same type because they share the same characteristics and can participate in the same relationships.

Epistemology: The study of the nature and foundations of knowledge.

Executive Information Systems (EIS): A computerized system intended to provide current and appropriate information to support executive decision making for managers using a networked workstation. The emphasis is on graphical displays and an easy to use interface that present information from the corporate database. They are tools to provide canned reports or briefing books to top-level executives. They offer strong reporting and drill-down capabilities. These tools must provide information in context to convert information to knowledge.

Executive Support Systems (ESS): An executive information system (EIS) that includes specific decision aiding and/or analysis capabilities.

Explicit Knowledge: Formal knowledge that can be conveyed from one person to another in systematic ways such as documents, e-mail, multimedia, etc. Knowledge that's easily codified and conveyed to others.

Extensible Markup Language (XML): A specification developed by the World Wide Web Consortium (W3C) especially for web documents. It allows designers to create their own customized tags, enabling the definition, transmission, validation, and interpretation of data between applications and among organizations. These customized tags can provide functionality not available with HTML. For example, XML supports links that point to multiple documents, as opposed to HTML links, which can reference just one destination each.

Governance: The act, process, or exercise of authority and control including the persons who make up a governing body to administer such actions.

Heuristic: A rule of thumb that involves or serves as an aid to learning, discovery, or problem solving by experimental and especially trial-and-error methods. Of or relating to exploratory problem-solving techniques that utilize self-educating techniques (as the evaluation of feedback) to improve performance.

Horizontal Portal: A portal, which pulls together several vertical portals and is standardized across an enterprise.

Human capital: Tacit knowledge which includes the skills, experience, insight, intuition, and judgment shaped by the past and present. Human capital accounts for the majority of The Army's intellectual capital, or the tacit knowledge that is resident within the mind of each employee, as well as the future capacity and potential for learning that we each have. An equally important asset is our potential.

Hyper Text Markup Language (HTML): An authoring language used to create documents on the World Wide Web.

Implicit Knowledge: The sum or range of what has been perceived, discovered, or learned. Implicit Knowledge is contrasted with explicit knowledge.

Incentivize: Using awards or rewards to entice, lead, or otherwise encourage individuals, groups or organizations to do a certain thing.

Information: A message, usually in the form of a document or an audible or visible communication meant to change the way the receiver perceives something, that has an impact on the receiver's judgment and behavior. Information is data that makes a difference as well as patterns in the data. A collection of facts or data: statistical information.

Information Architecture: The art and science of organizing information to help people effectively fulfill their information needs. Information architecture involves investigation, analysis, design and implementation.

Infostructure: The information technology (computers, software, architecture, security, communications, programs and facilities) required to support the net-centric Army.

Intellectual Capital: The knowledge resulting from communications, collaboration, interpersonal relationships; ideas, patents and organizational processes; and tangible information resources such as databases, documents, lessons-learned systems, etc. Intellectual capital includes human capital, social capital and corporate capital that contribute to the growth of the organization. It can also be the knowledge and potential of employees, based on their education, experience, learned techniques, and best practices.

Interface: The ability to connect two separate entities such as programs, devices, or programs to devices. For example, two devices that can transmit data between each other are said to interface with each other.

Intranet: A network based on TCP/IP protocols (an internet) belonging to an organization, usually a corporation, accessible only by the organization's members, employees, or others with authorization. An intranet's web sites look and act just like any other web sites, but the firewall surrounding an intranet fends off unauthorized access. Like the Internet itself, intranets are used to share information. Secure intranets are now the fastest-growing segment of the Internet because they are much less expensive to build and manage than private networks based on proprietary protocols.

ISO 9000: Family of quality management and quality assurance standards adopted by ISO (International Organization for Standardization, founded 1947), an international consensus of over 110 countries. ISO 9000, first published in 1987, has been adopted as national standards in more than 80 countries.

Knowledge: A fluid mix of framed experience, values, contextual information, and expert insight that provides a framework for evaluating and incorporating new experiences and information for decision-making.

Knowledge Acquisition: The procedure in artificial intelligence of interacting with an external source, usually a domain expert, to find and organize knowledge for the purpose of transferring the knowledge to an expert system to solve problems.

Knowledge Assets: Business data, information, and knowledge.

Knowledge Base: A logical collection of information in a particular domain that has been formalized in the appropriate representation to perform reasoning. A dynamic knowledge base is used to store information relevant to solving a particular problem and varies from one problem-solving session to the next.

Knowledge Discovery: A nontrivial process that gleans new, understandable, interesting, and potentially useful information from stored data. Knowledge discovery is a means of extending limited human capabilities by using computer capabilities to analyze large, often complex datasets in order to understand more information than could have been previously extracted using conventional means.

Knowledge Ecology: An inter-disciplinary field of theory and practice that provides tools and methods for freeing the human genius, individual and collective. It is the component of KM that focuses on human factors; the study of personal work habits, values, and organizational culture.

Knowledge Half-Life: The point at which the acquisition of new knowledge is more cost-effective and offers greater returns than the maintenance of existing knowledge.

Knowledge Management: An integrated, systematic approach to identifying, managing, and sharing all of an enterprise's information assets, including databases, documents, policies and procedures, as well as previously unarticulated expertise and experience resident in individual workers. Fundamentally, KM makes the collective information and experience of an enterprise available to the individual knowledge worker, who is responsible for using it wisely and for replenishing the stock. This ongoing cycle encourages a leaning organization, stimulates collaboration, and empowers people to continually enhance the way they perform work.

Knowledge Map (K-map): A navigational aid that enables a user to rapidly hone in on the desired concept from a representation of concepts and their relationships (e.g., a hierarchy, a taxonomy, or a network) and then follow links to the relevant knowledge sources (information or people). K-maps model explicit information about people, processes and their information objects, plus the relationships among these elements.

Knowledge Mapping: A process that provides a "picture" of the knowledge an organization needs to support business processes.

Learning Organization: Term popularized by Peter Senge's *The Fifth Discipline*, meaning a corporate culture that cherishes continuous improvement.

Legacy Systems: Existing information systems and/or databases that may or may not be migrated to a new system that uses newer technology for more efficient and effective delivery.

Liaison: A channel for communication between groups or individuals.

Link or Hyperlink: A connection between two pieces of information. A reference (link) from some point in one document to (some point in) another document or another place in the same document. A browser usually displays a hyperlink in some distinguishing way, e.g. in a different color, font or style. When the user activates the link (e.g. by clicking on it with the mouse) the browser will display the target of the link.

Metadata: Data about data. Metadata describes how and when and by whom a particular set of data was collected, and how the data is formatted. Metadata may include descriptive information about the context, quality and condition, or characteristics of data.

Network-centric: Refers to the use of networked technology to deliver information and data electronically.

Performance Measure: An indicator that can be used to evaluate quality, cost, or cycle time characteristics of an activity or process usually against a target or standard value.

Portal: Software that provides access through a browser to a wide range of data stores – e-mail, data bases, analytical software, the Internet, billing and sales records, and other sources. A portal is different from other web pages in that a portal is customizable by the user as his needs and interests change.

Process: A systematic series of actions directed to some end.

Process Portal: Software that focuses the user of the portal to the explicit knowledge required to solve his/her particular problem, or deal with a particular situation or series of events. Changes implicit knowledge to explicit knowledge.

Push: In client/server applications, "pushing" is sending data to a client without the client requesting it. The World Wide Web is based on a pull technology where the client browser must request a web page before it is sent. Broadcast media, on the other hand, are push technologies because they send information out regardless of whether anyone is tuned in.

Repository: A mechanism for storing any information that has to do with the definition of a system at any point in its life cycle. Repository services would typically be provided for extensibility, recovery, integrity, naming standards and a wide variety of other management functions.

Resource: An object in competition with another like object. A resource is a scarce object.

Rules of Thumb: Shortcuts to solutions to new problems that resemble problems previously solved by experienced workers; heuristics.

Search & Deliver: Bringing knowledge to teams and communities through portals built on personalized cross-enterprise search and delivery technologies.

Search Engine: Software that helps a person find a piece of information. A public search engine such as Google or AltaVista uses programs that visit each web site on the Internet and copy each page into a database on its server. A user then asks the program to look through the database for a word the user enters. The programs that visit each site are called spiders or robots, and visiting each site is called crawling.

Signature Skill: An ability by which a person prefers to identify himself or herself professionally.

Social Capital: The intellectual capital resulting from communications, collaboration and interpersonal relationships. It includes human and virtual networks, relationships and the interactions across these networks built on those relationships.

Tacit Knowledge: Personal knowledge that resides within an individual that relies on experiences, ideas, insights, values, and judgments. Knowledge that is resident within the mind, behavior, and perceptions of individuals. Knowledge developed and internalized by an individual over a long period of time incorporating so much accrued and embedded learning that its rules may be impossible to separate from how an individual acts.

Taxonomy: A framework for the classification and arrangement of objects.

Team: A number of persons associated in the performance of a task.

Teamware: A category of software that enables colleagues, especially geographically dispersed colleagues, to collaborate on projects. Typically, teamware uses the Internet and the World Wide Web to facilitate communication among the team.

Topic Area: A cross-functional grouping of business areas (grouping of processes). Examples of topic areas are finance, program management, administration, and research.

Vertical Portal: A vertical portal is a portal that serves a specific community of interest. An organization may have several vertical portals, but will probably have only one horizontal portal.

Virtual: Indicates simulation technology that enables the user to cross boundaries and experience something without needing its physical presence, as virtual theme parks, virtual communities.

Virtual Team: Three or more dispersed people working on the same common goal using information technology. The goal or project may be a product or service. The technology may range from simple e-mail to advanced digitized design. The team electronically shares the same information, concurrently when necessary. The team works effectively together trusting other members that they may never meet. The short definition is moving work to people.

Web Browser: A software application used to locate and display web pages. The two most popular browsers are Netscape Navigator and Microsoft Internet Explorer. Both of these are graphical browsers, which means that they can display graphics as well as text. In addition, most modern browsers can present multimedia information, including sound and video, though they require plug-ins for some formats.

Web-Enabled: The use of technology to run efficient programs and services, including an Intranet, over the Internet.

Work Cell: A collection of roles in an organization that crosses functional barriers.

Workflow: A system whose elements are activities, related to one another by a trigger relation, and triggered by external events, which represent a business process starting with a commitment and ending with the termination of that commitment.

XML: Extensible Markup Language. XML is a subset of Standard Generalized Markup Language (SGML) that is used for putting structured data in a text file. XML is a family of standards and technologies similar to HTML.

Charter
DEPARTMENT OF THE ARMY
CHIEF INFORMATION OFFICER EXECUTIVE BOARD

1 Name of Committee. Army Chief Information Officer (CIO) Executive Board

2 Date Established. April 2001

3 Date to be Determined. The Board will continue as long as the need exists.

4 Category and Type of Committee. The Board is an intra-Army departmental committee.

5 Mission. The Army CIO Executive Board (hereinafter referred to as the "Board") is an executive forum to advise The Army CIO on the full range of matters pertaining to information management (IM) and information technology (IT), Clinger-Cohen Act (Public Law 104-106) (formerly Division E, Information Technology Management Reform Act, Defense Authorization Act of 1996), Government Paperwork Reduction Act (Public Law 104-13), Government Performance and Results Act (Public Law 103-62), and other related Federal and DoD guidance.

6 Purpose. The purpose of the Board is to provide Army leadership in Clinger-Cohen Act implementation and identify and resolve enterprise-level issues related to CIO responsibilities. In addition, the Board will identify opportunities, make recommendations for, and sponsor cooperation in using information resources. The Board will coordinate with the DoD CIO Executive Board and the Federal CIO Council on matters of mutual interest.

7 Functions.

a Management Oversight. Advise and make recommendations to The Army CIO on overall Army IM/IT policy, processes, procedures, standards, priorities, and resources, as appropriate.

b Alignment of IM/IT and Army Missions. Ensure that IM/IT programs and systems are strategically aligned with enterprise-wide Army missions, strategic plans, and initiatives, such as the Transformation and the Quadrennial Defense Review.

c Functional System Integration. Advise and make recommendations to The Army CIO on policies and procedures that will enhance The Army CIO's

oversight and integration of IM/IT programs and systems within and across functional areas to include the horizontal integration of technology. Identify enterprise-level CIO challenges that cross-functional boundaries and make recommendations to the CIO regarding resolution of those challenges.

d Resource Allocation Process. Recommend measures to strengthen integration of the IT capital planning and investment process with the Planning, Programming, Budgeting, and Execution System (PPBES). In addition, review IT funding and program issues and make recommendations on investment priorities and resources alignments in the context of the PPBES.

e Knowledge Management. Promote and support knowledge management concepts and initiatives throughout The Army. Identify and resolve issues relating to enterprise knowledge management programs. Acquisition Process. Advise The Army CIO on program synchronization and standardization issues resulting from program and portfolio reviews. Recommend appropriate IT program and acquisition actions to be taken.

f Interoperability, Information Assurance or Communications and Computing Infrastructure Reviews. Advise and make recommendations to The Army CIO on issues of interoperability, information assurance, and communications and computing information systems infrastructures.

g Human Resources Management. Recommend and support strategies for recruiting, retaining, and training IM and IT personnel across The Army.

h Architecture Management. Assist The Army CIO in ensuring that processes are in place to enforce standardized use, management, and control of architectures.

i Process Improvement and Performance Measures. Share experiences, ideas and promising practices, including work process redesign and the development of performance measures, to improve the management of information resources. Recommend and promote results-based performance measures and best practices that strengthen and optimize links between IM and Army missions, and improve Army mission performance.

j Electronic Business/Electronic Commerce Operations. Recommend measures that will promote, enhance, and safeguard the use of electronic business/electronic commerce techniques and technologies throughout The Army in such areas as smart cards and other secure electronic transactions-devices.

k Other Business. At the option of the Chair with advice of the Board, address any areas and issues not specified above.

8 Direction and Control. The Director of Information Systems for Command, Control, Communications and Computers (DISC4), designated The Army CIO by the Secretary of The Army on 19 March 1996, will chair the Board.

9 Authority. Title 10 USC Sec 2223, PL 105-261, National Defense Authorization Act, FY 1999 Title 40 USC Sec 1425, PL 104-106, Division E, Clinger-Cohen Act of 1996 Executive Order 13011, Federal Information Technology, 1996 AR 15-1, Committee Management, 1992 AR 25-1, Army Information Management, 2000

10 Administrative Support and Staff Arrangements. The Board Executive Secretary will be the ODISC4 Director for Information Management with the CIO Integration Directorate providing administrative support for the Board.

11 Composition. Senior level representatives from the Headquarters staff agencies and Major Army Commands.

a Chair. Director of Information Systems for Command, Control, Communications, and Computers / Chief Information Officer (Army CIO).

b Members.

1 Administrative Assistant to the Secretary of The Army
2 Assistant Secretary of The Army (Acquisition, Logistics and Technology)
3 Assistant Secretary of The Army (Civil Works)
4 Assistant Secretary of The Army (Financial Management and Comptroller)
5 Assistant Secretary of The Army (Installations and Environment)
6 Assistant Secretary of The Army (Manpower and Reserve Affairs)
7 Chief of Public Affairs
8 Deputy Under Secretary (International Affairs)
9 Deputy Under Secretary (Operations Research)
10 Director of The Army Staff
11 Director of Program Analysis and Evaluation
12 Deputy Chief of Staff for Programs
13 Deputy Chief of Staff for Intelligence
14 Deputy Chief of Staff for Logistics
15 Deputy Chief of Staff for Operations and Plans
16 Deputy Chief of Staff for Personnel
17 Assistant Chief of Staff for Installation Management

18 Chief of Engineers
19 The Surgeon General
20 The Judge Advocate General
21 Chief, National Guard Bureau
22 Chief, Army Reserve
23 Eighth U. S. Army
24 Military Traffic Management Command
25 U. S. Army Forces Command
26 U. S. Army Corps of Engineers
27 U. S. Army Criminal Investigation Command
28 U. S. Army Europe and Seventh Army
29 U. S. Army Intelligence and Security Command
30 U. S. Army Materiel Command
31 U. S. Army Medical Command
32 U. S. Army Military Academy
33 U. S. Army Military District Of Washington
34 U. S. Army Pacific
35 U. S. Army South
36 U. S. Army Space and Missile Defense Command
37 U. S. Army Special Operations Command
38 U. S. Army Test and Evaluation Command
39 U. S. Army Training and Doctrine Command

c Advisors.

1 Army General Counsel
2 Inspector General
3 Auditor General
4 Legislative Liaison
5 Program Executive Officer for Command, Control, and Communications Systems
6 Program Executive Officer for Standard Army Management Information Systems
7 Program Executive Officer for Intelligence and Electronic Warfare
8 Program Executive Officer for Information Systems (National Guard Bureau)

12 Responsibilities.

a Chair

1 Call and chair Board meetings quarterly or at his discretion.
2 Approve agendas.
3 Assign actions and tasks.

4 Convene and assign *ad hoc* teams to perform specific tasks or develop specific
5 Products needed by the Board
6 Resolve IM and IT issues.
7 Seek Board recommendations on issues.
8 Approve minutes.

b Members

1 Identify and nominate agenda items and issues to the Board's Executive Secretary for consideration.
2 Sponsor items and issues for meetings, including preparation of position papers and read-ahead materials, and presentation of briefings.
3 Represent their organizations' positions with regard to Board issues.
4 Convey and support the positions and decisions of the Chair to their organizations.
5 Execute actions and tasks as directed by the Chair.
6 Ensure their organizations are represented on appropriate Board subordinate bodies.
7 Keep the Board appraised of relevant and significant IM/IT related matters.
8 Review minutes.

c Executive Secretary

1 Propose issues and processes to support the functions of the Board. Conduct analyses and reviews as directed by The Army CIO or The Army CIO Executive Board.
2 Provide advice and counsel to the Chair on Board matters.
3 At the direction of the Chair, formulate, research, and present Army CIO issues before the Board.
4 Structure issues and ensures proper representation on items before the Board.
5 Announce and stage meetings at Chair's direction.
6 Ensure all security rules and regulations regarding classified meetings and documents are followed.
7 Assemble, prepare, and distribute material on matters under consideration by the Board at least four working days in advance.
8 Disseminate specific requirements for data and other actions on behalf of the Board.
9 Disseminate to appropriate Army officials, decisions reached by the Chair.

10 Monitor and track follow-on actions taken to ensure that decisions reached and assignments made by the Chair are implemented properly.
11 Prepare and distribute minutes of Board meetings.
12 Maintain and safeguard records and ensure their appropriate disposition.
13 Support and coordinate the activities of the Board's subordinate bodies.
14 Compile and maintain contact lists for Board members and their coordinating staffs.

d Advisors. Provide advice as directed by The Army CIO and the Executive Board.

13 Committee Level and Other Data. The Enterprise Strategy, Army Knowledge Online, and The Army Smart Card Configuration Management Control Board are General Officer Steering Committees (GOSC) that The Army CIO Executive Board will initially work with and that will eventually be absorbed and dissolved. The Board will work with various existing DISC4-led GOSCs and working groups (e.g. Installation Information Infrastructure Architecture Configuration Control Board, Information Systems Vulnerability and Protection IPT, Information Technology Investment Strategy Working Group, Smart Card IPT, Electronic Business/ Electronic Commerce IPT). The Board will have the authority to establish standing working groups and committees as necessary to consider items of concern and to research, analyze and recommend solutions. A Board member shall be responsible for each committee or working group.

14 Correspondence. The Board will establish an email address for incoming and outgoing communications. Additionally, a secure web site will be developed to download draft and final documents, discuss issues, and share ideas.

15 Frequency of Meetings. The Board will meet quarterly or at the chair's discretion.

16 Date Revised Charter Filed.